

# FINANCIAL TIMES

No.30,623

Tuesday August 23 1988

D 8523 A

JAPAN

Asia test for new foreign policy

Page 22

Australia	£52.22	Indonesia	£31.00	Portugal	£52.22
Belgium	£106.50	Israel	£31.00	Spain	£52.22
Canada	£106.50	Italy	£17.00	Sweden	£52.22
Denmark	£106.50	Japan	£17.00	Switzerland	£52.22
France	£106.50	Korea	£17.00	Taiwan	£52.22
Germany	£106.50	Malaysia	£17.00	Thailand	£52.22
Greece	£106.50	Mexico	£17.00	Turkey	£52.22
Hong Kong	£106.50	Norway	£17.00	USA	£52.22
India	£106.50	Poland	£17.00		

## World News

### Navy man killed by N Ireland car bomb

A man believed to be a Royal Navy recruitment officer was killed in an IRA car bomb attack in Northern Ireland as Ulster Secretary Tom King was discussing improved security following Saturday's coach bombing which left eight soldiers dead.

### New Pretoria ban

The South African authorities banned the End Conscription Campaign, a white dissident group, from "carrying on or performing any activities or acts whatsoever." It was the 19th anti-apartheid organisation to receive such treatment in a renewed clampdown on dissident activities this year.

### Zia guards held

Fifty-five members of an army unit which guarded Gen Zia's aircraft immediately before its ill-fated flight have been held for questioning, along with several air force personnel who serviced the plane. More than 700 people have been interrogated so far.

### Burma erupts again

Lawyers and doctors joined renewed protests in Rangoon, Mandalay and other Burmese cities against the 26-year-old socialist Government, following the appointment of Maung Maung to lead the ruling Burma Socialist Programme Party on Friday.

### Burundi toll mounts

Army helicopters and armoured cars reportedly hunted down peasants fleeing from continuing tribal massacres in the central African state of Burundi. The death toll is estimated in the tens of thousands.

### Korea talks stalled

Talks between North and South Korean parliamentarians on the North's threatened boycott of next month's Olympic games and a non-aggression pact ended in deadlock.

### Cypriots to meet

Turkish-Cypriot leader Rauf Denktaş and Greek-Cypriot President George Vassiliou arrived in Geneva for two days of UN-sponsored peace talks.

### Serbs plan protests

Serbs and Montenegrins in Yugoslavia's ethnically-torn Kosovo province announced plans to protest against alleged persecution by Albanian nationalists.

### US terror league

The US State Department named Afghanistan responsible for 127 out of 189 acts of state-sponsored terrorism in 1987. It was followed by Iran and Libya.

### Australian reshuffle

Australian Prime Minister Bob Hawke reshuffled his Cabinet following last week's resignation by Foreign Minister Bill Hayden to take up the post of Governor General.

### West Bank curfew

Israeli troops shot and wounded nine Palestinians and placed Nablus, the largest Arab city in the West Bank, under curfew during a general strike in the occupied territories.

## Business Summary

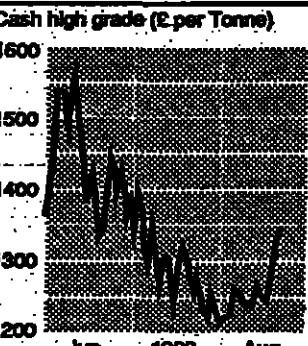
### Bond Corp profits more than treble to A\$402.6m

BOND CORPORATION, Perth-based company of Mr Alan Bond's multinational business empire, surprised analysts by reporting after-tax profits of A\$402.6m (US\$327m), more than treble the A\$128.2m recorded in the 12 months to June 1987.

WICKES Companies, leading US automotive products, wall coverings and fabrics manufacturer, has agreed to be taken private in a leveraged buyout led by its chairman, for \$12 a share or \$478.2m.

COPPER PRICES on the London Metal Exchange were buoyed by sterling's weakness. The cash grade A position

### Copper



reached a six-week high of \$1,349.50 a tonne, adding \$33.50 to last week's \$1,316 advance.

BAT INDUSTRIES, tobacco-based multinational, extended until Wednesday night the deadline for its \$72 per share increased offer for Farmers Group, US insurer.

IMPERIAL Chemical Industries, Britain's biggest chemicals company, plans to spend \$300m (£100m) a year in the 1990s on investments related to bulk materials production, a 50 per cent increase on the current figure.

IRISH DISTILLERS, Irish whisky producer, rejected a takeover offer of \$225m (£58.7m) from Grand Metropolitan, UK drinks group.

SAGA PETROLEUM, Norwegian oil independent, suffered a steep fall in first-half pre-tax profits to Nkr62m (\$8m) from Nkr255m last year, due to lower oil prices and a reduction in net financial income.

BANCA COMMERCIALE ITALIANA (BCI), Italian bank, and Iri, its parent company, were urgently studying the implications of unexpected intervention by the US Federal Reserve Board in BCI's attempt to acquire control of Irving Trust of New York.

UNITED PAPER MILLS, Finnish forest products group, reported that group turnover for the first half rose 14 per cent to Fm2.89bn (\$660m) while profit before taxes climbed 52 per cent to Fm367m.

HONGKONG Aircraft Engineering Company (Haseco), aircraft maintenance subsidiary of Swiss Pacific, reported a 37 per cent rise in profits to HK\$116.5m (US\$15m) for the first half.

MIM HOLDINGS, Brisbane-based resources group, said that net profits more than quadrupled to A\$172.9m (US\$140m) from A\$39.5m last year.

WEST GERMANY's money supply growth slowed last month, but remained above the target range set for this year. M3, the broad monetary aggregate, rose in July at an adjusted annual rate of 6.7 per cent, compared with 7.4 per cent in June.

## Warsaw moves to quell strikes

By Our Foreign Staff

THE POLISH authorities last night moved to quell the growing waves of strikes throughout the country and announced that they had empowered local authorities to impose curfews in three regions hit by strikes.

The announcement was made on state television by General Czeslaw Kiszczak, the Interior Minister.

Earlier yesterday police stormed tram and bus depots occupied by strikers in the north western city of Szczecin and surrounded at least 10 striking mines in the Katowice region of southern Poland, and the Lenin shipyard in Gdansk.

The move appeared to signal a decision by the authorities to take firm action in the face of a swelling wave of strikes by workers demanding official recognition of Solidarity, the

outlawed independent trade union.

The unrest, in which tens of thousands of workers have been idled, yesterday, spread to Warsaw. Earlier, Mr Lech Walesa, leader of Solidarity, joined several hundred workers in the Lenin shipyard who went on strike in sympathy with more than 10,000 striking coal miners in southern Poland. Riot police quickly sealed off the shipyard.

State radio said work was disrupted at the big Huta Warszawa steelworks in the capital. Talks were under way with strikers. The radio said there had been attempts by about 80 workers to call a strike at the Ursus tractor factory in Warsaw but the other workers did not respond to the appeal.

In Szczecin, witnesses said

police took arrested strikers away in vehicles.

Mr Walesa's entry into the widening confrontation with the Government was the most significant development in eight days of growing labour unrest.

Demands for the reinstatement of Solidarity, which posed a serious threat to the authority of the Polish Government in 1980 and 1981 and created anxiety in the Kremlin, represent another test for the leadership of General Wojciech Jaruzelski.

Polish political observers said a crackdown by Gen Jaruzelski on the strikers would eliminate his last hope of establishing a dialogue with large segments of the disaffected population.

A further ominous sign for

Gen Jaruzelski was a strike begun yesterday by nearly 2,000 workers in the Stalowa Wola steel mill south of Warsaw which employs 18,000.

The strikes, fuelled by demands for wage rises as well as the legalisation of Solidarity, are widely believed in Poland to be more volatile and dangerous for the Government than those earlier this year.

As riot police sealed off the Gdansk shipyard, striking workers marched through the yard with Solidarity banners and chanted.

Mr Walesa said he did not want to be chairman of the strike committee but would join his fellow striking workers. He also took part in the strikes last April and May which were quashed by the authorities.



Solidarity leader Lech Walesa addressing a rally

## North Sea oil groups will be required to raise safety standards

By Steven Butler in London

OIL COMPANIES operating in the North Sea could face hundreds of millions of pounds in extra costs as a result of British Government moves this week to tighten safety standards.

The action is a result of the explosion on the Piper Alpha oil platform, killing 167 people.

Ministers are putting final touches on a directive that will require oil companies to submit plans to modify their offshore installations.

This could force the industry to fit existing platforms with underwater emergency shut-off valves on pipelines.

Britain's Department of Energy said the document was likely to be issued tomorrow.

The failure of an emergency shut-off valve on board the Piper Alpha platform is now suspected to have been a significant contributing factor to the severity of the explosions and fire that ripped the platform apart on July 6, causing much of it to topple into the sea.

It is now believed that, after an initial explosion at a gas compressor on the platform, compressed gas in the 30-mile long export pipeline to the Frigg gas line came rushing back to Piper Alpha, supplying a massive amount of explosive fuel to the fire on the platform.

Experts say that oil and gas

present on the platform at the time of the initial explosion was insufficient to explain the severity of the disaster.

Occidental Petroleum, which operates the Piper field, said yesterday it could not confirm whether a safety valve had been blocked out by the initial explosion on the platform, or had otherwise failed, and that this was under investigation by a technical team from the Department of Energy.

An alternate theory is that the initial explosion led to a rupture of gas pipelines, which ran some 15 feet beneath the compressor module, on the downstream side of the valves.

Occidental has announced that it will install subsea (underwater) shut-off valves as an added safety measure for its Claymore platform, which is of similar design to Piper Alpha.

Such valves would be designed to close automatically in the event of an incident on board a platform and would be far enough away to be unaffected by fires or explosions.

The major oil companies, however, disagree about whether reliable technology is currently available for retrofitting existing installations with subsea valves.

This would require divers to cut existing pipelines and flood them with water while valves were installed. Each such operation would require millions of pounds for installation and lost

production.

Valves currently in use also require frequent maintenance, which would be impractical on the seabed. Some companies argue that careful placement of valves on board platforms provides adequate safety.

The Department of Energy directive is therefore expected merely to require North Sea operators to examine current safety shut-off systems and to submit reports about possible modifications in the light of what happened at Piper Alpha.

However, if some companies move ahead with workable subsea schemes, the Department of Energy could decide to encourage or mandate wider use of the technology.

The directive this week is to be the first interim report from the department's technical inquiry into the causes of the Piper Alpha disaster.

A final report is expected to be ready in late September, although this may not be released directly to the public, but rather to the public disaster inquiry headed by Lord Cullen at Aberdeen.

The public inquiry is likely to start in October but could take a year before issuing any final report with broader safety recommendations for the industry.

## Englishmen raise glass to all-day drinking

By FT reporters in London

BRITONS stayed in their pubs yesterday, or at least more of them did for more of the day.

This was because of a historic change in legislation, made after much heart searching in the highest councils of the land, that pubs (bars to the uninitiated) may now stay open all day.

The last time most Englishmen were able to down a pint and play darts in a public house at 3:30 in the afternoon, Queen Elizabeth's grandfather was on the throne and Britain was fighting a war to end all wars.

Since World War One, however, most pubs have had to bar their doors to drinkers between three and five in the afternoon. The law was aimed at keeping munitions workers sober.

What it did, modern-day critics say, was to keep the population parched for no good reason and send tourists wondering why they could not get a drink in the middle of the day.

Prime Minister Margaret Thatcher agreed. If there was to be freedom of choice in industry, there should be similar freedoms in Britain's pubs, she declared the ruling Conservative party's election manifesto soberly.

In response to fears that Britain would lurch into an orgy of drunken absenteeism the Government responded:

Continued on Page 22

## Central banks fail to keep lid on lively dollar

By Simon Holberton, Economics Staff, in London

THE DOLLAR yesterday brushed aside another round of concerted central bank intervention, closing higher in London and prompting speculation of further rises in European interest rates.

Frequent bouts of central bank intervention succeeded in knocking the US currency off its highs of the day, but it was not enough to change the market's generally positive view of the US currency over the medium term.

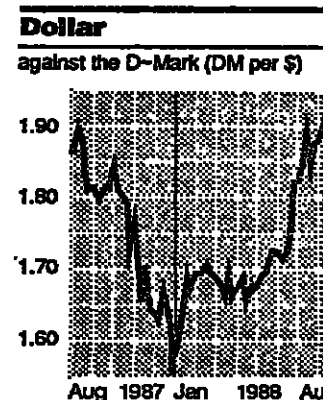
Throughout the day, currency markets tested key levels for the dollar and for the yen against the D-Mark. By the London close, the dollar had firmed more than 2½ pence, while the yen straddled ¥70 to DM1.

Most central banks in Europe, including the Bundesbank, the West German central bank, and the Bank of England, together with the US Federal Reserve, were involved in the attempt to stem the dollar's rise.

The US currency is seen by market operators to be well supported by the current level of US interest rates and by an apparent division in the ranks of the G7 major industrialised countries over the operation of the Louvre Accord.

Analysts believe the US presidential elections in November are also acting as a constraint on G7 policy co-ordination and this is positive for the dollar over the medium-term.

But monetary officials in London and continental



Europe cautioned the currency markets against complacency. The UK Treasury reaffirmed the Louvre Accord, which it said was alive and functioning. The Treasuries and central banks of the G7 were in close communication, it said.

In continental Europe, monetary officials hinted that the recent co-ordinated intervention, which they conceded were more public demonstrations of intent rather than a large-scale selling of dollar, might be a prelude to a much more concerted move on the US currency.

Analysts said that the recent forays of central banks into currency markets had not been very aggressive. They interpret the current US and G7 policy as simply holding the line until Mr George Bush, the Republic-

Continued on Page 22

## Bush withdraws Quayle from front line of election campaign

By Lionel Barber in Washington

VICE-PRESIDENT George Bush has been forced to withdraw his chosen running-mate, Senator Dan Quayle, from the campaign front line because of the controversy still swirling about his military service during the Vietnam war.

As Mr Bush delivered a speech to the Veterans of Foreign Wars convention in Chicago and strongly supported his running-mate, Mr Quayle underwent coaching sessions in Washington devoted to explaining why he used wealthy family connections to gain a place in the National Guard rather than fight in the Vietnam war.

Mr Bush delivered a passionate defence of Mr Quayle. "True he didn't go to Vietnam, but his unit wasn't sent," he said. "Dan Quayle served in a unit that had vacancies at the time and now he is under shrill partisan attack... he served honorably."

Senator Bush campaign off-

icials continued to insist that they intended to ride out the storm over Mr Quayle, barring any new embarrassing revelations. The 41-year-old Indiana Senator, a surprise choice on the Republican ticket, is expected to lead the campaign trail tomorrow on his own.

Mr Quayle stepped into a fresh controversy yesterday, however, when he appeared on breakfast television shows and admitted that he was a mediocre "provincial C-plus student" in college. But he denied that his family pulled strings to get him into law school.

Mr Bush's decision to appoint a little-known and inexperienced running mate is considered to be a blunder which will continue to haunt his campaign for weeks. As Mr James Reston, the veteran New York Times commentator wrote yesterday: "His (Bush's) judgment is now an issue more than ever - not whether this bird from Indiana can fly or whether he dodged the Viet-

nam draft but whether Bush would pick the best available people to help govern the country."

Senator Robert Dole of Kansas, who was considered a strong choice as a running mate for Mr Bush, kept the controversy alive saying that Mr Quayle's presence on the ticket was hurting the Vice-President.

Senator Dole, himself a war hero, said: "I must tell you, in my generation, you knew who was in the Guard and who was in uniform fighting for their country."

Other political commentators said that the inevitable rash of stories about Mr Quayle and his past would obscure Mr Bush's best efforts to get his message across to voters. This is doubly infuriating for the Vice-President who appears to have bounced ahead of his Democratic rival Governor Michael Dukakis of Massachusetts in the latest opinion polls.

## Contents

### The UN has grown in stature with its recent successes

Much credit is due to Mr Javier Perez de Cuellar, UN Secretary-General, for recent successes in the Gulf, Afghanistan and Angola. The world body, however, may just be rationalising the concept of might is right.

Europe	2	Agriculture	28	Raw Materials	28
Companies	2	Art-Reviews	18	Stock Markets	28
America	2	World Guide	18	International bonds	28
Companies	2	Commodities	28	Int. Capital Markets	28
Overseas	2	Crossword	28	Labour	28
Companies	2	Money Markets	28	Management	28
World Trade	2	Currencies	28	Unit Trusts	28
Britain	2	Editorial Comment	28	Money Markets	28
Companies	2	Steno-Options	28	Observer	28

### Management's UK accountants' ambivalence towards the smaller client

Technology Revving up for the volume plastic car.

Editorial comment: Mr Botha's dilemma: New target for UK takeovers.

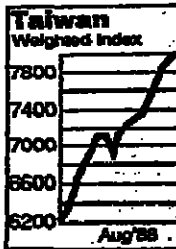
International mail: Private sector delivers challenge to public postal services.

Sweden: Traditional trust of the authorities has been hit by scandals.

LEZ Markets: Eurotunnel; Bond Corporation; ADZ.

US computers: Acquisitions are essential for Unisys's expansion.

## Markets



INTEREST RATES  
US Treasury 8%  
Federal Funds 8%  
3-mth Treasury Bill  
yield: 7.27% (7.25)  
Long Bond: 97.3  
(97.4)  
yield: 8.41% (8.4)  
3-month interbank  
close 11.5 (11.5)

STERLING  
New York close  
\$1.6860 (1.6865)  
London  
\$1.6785 (1.702)  
DM\$2.175 (3.22)  
FF10.9050 (10.8175)  
Sfr2.7025 (2.7075)  
Y224.75 (227.25)

DOLLAR  
New York close  
DM1.9090 (1.8975)  
FF6.4815 (6.4335)  
Sfr1.60145 (1.5965)  
Y133.675 (133.65)  
London  
DM1.919 (1.892)  
FF6.5050 (6.415)  
Sfr1.6115 (1.5915)  
Y134.05 (133.45)

STOCK INDICES  
New York close  
Dow Jones Ind. Av.  
1,990.22 (-25.78)  
S&P Comp  
255.98 (-3.26)  
London  
FT-100  
1,832.3 (-12)  
World  
125.75 (Fr)  
Tokyo close  
Nikkei Ave  
28,079.18 (-130.24)  
Frankfurt  
Commerzbank  
1,467.8 (+0.7)

OIL  
Brent 15-day (Argus)  
\$15.15 (+1.55)  
West Tex Crude  
\$15.825 (+0.15)

## You don't become No.1 in Futures without the Back Office to match.

For the third year in succession Phillips & Drew have been voted top in Futures & Options in the Extel Ranking of UK Investment Analysts.

The reliability of Back Office service, so important to the smooth operation of a Futures & Options division on a day-to-day level, makes a major contribution to our success. An efficient Back Office means you don't have to worry about positions, settlement dates and delivery. You also have immediate access to accurate daily reports for open positions, cash analysis and financial settlements and you can benefit from our central clearing facility.

Phillips & Drew Futures Ltd are founder clearing members of LIFFE. Our clients benefit from the Union Bank of Switzerland/Phillips & Drew Group's unrivalled global trading and research facilities.

For further details about these services, call Chris Graham on 01-628 4444 or return the coupon.

## PHILLIPS & DREW

To: JCM Graham, Phillips & Drew Futures Ltd, 120 Moorgate, London EC2M 6XP. Tel: 01-628 4444.

Please send me full details about your services.

Name: \_\_\_\_\_

Company: \_\_\_\_\_

Address: \_\_\_\_\_

Phillips & Drew Futures Ltd  
A MEMBER OF THE UNION BANK OF SWITZERLAND GROUP



## EUROPEAN NEWS

## Soviet co-operatives take off in a big way

By John Lloyd in Moscow

THE SOVIET co-operative movement, which put down tentative roots some two years ago, is growing explosively, according to the first official figures.

It is also now able to pay its workers, on average, between 1.5 and two times more than workers in state enterprises — and public opinion, which was initially distrustful, is now swinging heavily in its favour. A survey in the newspaper *Economic Gazette* says that opinion polls show more than two-thirds of those polled

favour co-ops, against a third of those polled a year ago. A residue of popular distrust that they are profiteering does remain, however, exemplified in the popular joke which runs: "Do you want to hear the joke about co-ops?" "Yes." "Give me a ruble."

In the year from July 1987, the total number of co-ops in the Soviet Union grew from 3,709 to 33,561. Their total turnover increased from Roubles 29.2m (\$46.7bn) to Roubles 104bn in the same period. Just over half (16,324, with a

turnover of Roubles 528m) are in the Russian Republic. Ukraine has 5,266, turning over Roubles 151.8m. The republics of Byelorussia, Kazakhstan, Uzbekistan and Gruzia have more than 1,000 each.

The small but entrepreneurial Baltic republics of Estonia, Latvia and Lithuania have respectively 609, 540 and 917.

More than a third provide various types of domestic services, an area particularly neglected by the state, over 5,000 are in catering, presumably mainly restaurants, over

7,000 make some form of consumer goods, 5,640 offer transport, sports and other facilities, and over 1,600 use the waste or discarded equipment from plants in some form of recycling process.

*Economic Gazette* says that co-operatives have the immediate potential to employ several million more workers "on the basis of customer demand".

Surveys show, it adds, that the most successful and profitable — such as the Estonian Iris co-operative — are those which diversify into several different

activities. The Iris co-op produces car parts, servicing cars, making clothes and digging peat.

The law on co-operatives, passed last month, allows them to build houses and roads, conduct scientific research, offer tuition courses, and mine minerals and other natural resources.

Shareholding is now gradually spreading, allowing them to grow and also "giving the people who hold the shares the feeling of being their own bosses".

## S Africa blamed for uprooting of 6m people

By Robert Taylor in Oslo

ABOUT 6m people have been turned either into refugees or displaced persons in the countries bordering South Africa, as a result of the conflict between Pretoria and the Front-line states.

This estimate was made yesterday by Mr Javier Perez de Cuellar, the UN Secretary-General, speaking at a conference in Oslo on southern African refugees convened by the Organisation of African Unity (OAU) and endorsed by the UN General Assembly.

Norway, under Prime Minister Gro Harlem Brundtland, has taken over from Sweden, Palma, as the most important Nordic country diplomatically.

The aim of the gathering is to focus the attention of the world on the plight of the 6m uprooted people and adopt a declaration and plan of action to ease the crisis.

"It can no longer be ignored by the international community," Mr Robert Mugabe, Zimbabwe's President, told the delegates from 81 different states. Unlike most other areas of Africa, the desperate situation in the southern part of the continent is almost entirely due to politics and not natural disasters.

"Any lasting solution to the crisis depends on the end of apartheid," said Mr Perez de Cuellar. A background paper prepared for the conference said that South Africa was "regarding an undeclared war against its neighbours".

The UN estimates that as many as 5m people have either been displaced or affected by the civil wars in Angola and Mozambique, while a further 1m have been forced to flee for their lives and seek refuge in neighbouring states.

In Malawi alone there are believed to be 450,000 refugees in a country of just under 8m. They have come there from Mozambique, escaping the terror campaign of the South African-backed Renamo organisation.

A further 166,000 have moved to Zimbabwe, where a fifth refugee camp is about to be opened, 136,000 to Zambia, and 72,000 into Tanzania.

The UN High Commissioner for Refugees estimates that just over 3m people have been displaced in Mozambique by the internal armed conflict.

In a document prepared for the conference, the UN calculates that it will cost \$250m a year for the foreseeable future to resolve the refugee problem in southern Africa.

The cost of rebuilding the economic base of the area will be high, it admits. "But combining emergency assistance with sustainable rehabilitation and development of the economy will be much more cost-effective than simply continuing emergency humanitarian aid on its own."

The UN has costed a programme for revival in the region. This would involve rebuilding destroyed homes (\$50m annually), providing safe drinking water (\$25m), sanitation (\$15m), dealing with land erosion (\$30m), repairing roads and bridges (\$50m), and above all rehabilitating the area's agriculture (\$150m), improving food distribution (\$20m), and building up food stocks (\$40m).

On top of this, the UN believes a further \$100m a year will be needed for health support and a similar amount spent on education.

## OVERSEAS NEWS

## Burundi 'using helicopters' to kill civilians

BURUNDI'S dominant Tutsi tribe has been using helicopters, armoured vehicles, machine-guns and bayonets to slaughter the unarmed peasants of their ancient enemies, the Hutu, according to eyewitness accounts from refugees streaming into neighbouring Rwanda, *Reuters* reports from Kigali, Rwanda.

Tribal bloodshed has raged for a week in northern Burundi. The military government in Bujumbura told Western diplomats yesterday that the death toll was about 5,000 and calm had been restored.

Official Burundian accounts have spoken only of attacks on Tutsi by "traitors and outsiders".

Tutsi refugees who fled to Rwanda in the first few days of last week were followed by a much larger flood of Hutu who said the Hutu, dominated by the Tutsi, had moved in on Wednesday and launched a reprisal slaughter of the Hutu.

According to a Western diplomat in Bujumbura, the Foreign Minister, briefed foreign envoys yesterday, saying an estimated 5,000 people had died in outbreaks of violence. He did not mention killing by the armed forces, the diplomat said by telephone. The area of the killings is closed to outsiders.

Officials and UN refugee workers on the Rwandan side of the frontier have heard countless horrifying stories of the army massacring from the 35,000 Burundians who have fled north across the Akanyaru River.

Mr Code Classe, representative in Rwanda of the UN High Commissioner for Refugees, toured the border area at the weekend and said: "We cannot talk about a civil war because only one side is armed. It has become a massacre by the Burundian army."

The Tutsi dominate the central African state's politics and army. The Hutu make up 85 per cent of the population.

The killing has sent 35,000 people, mainly Hutu, fleeing into neighbouring Rwanda with tales of army reprisals against many thousands of defenceless peasants.

The Tutsi, a cattle-herding people, have lorded it over Hutu farmers in the fertile, well-watered lands at the northern end of Lake Tanganyika since pre-colonial times. Rwanda has a similar tribal make-up but the Rwandan Hutu overthrew Tutsi domination at the end of Belgium's colonial rule.

UN says big bout of tribal bloodletting in Burundi took place in 1972 when the Tutsi responded to a Hutu challenge with mass slaughter and the death toll was put by foreign experts at 100,000 or more.

Officials and UN refugee workers on the Rwandan side of the frontier have heard countless horrifying stories of the army massacring from the 35,000 Burundians who have fled north across the Akanyaru River.

Mr Code Classe, representative in Rwanda of the UN High Commissioner for Refugees, toured the border area at the weekend and said: "We cannot talk about a civil war because only one side is armed. It has become a massacre by the Burundian army."

The Tutsi dominate the central African state's politics and army. The Hutu make up 85 per cent of the population.

The killing has sent 35,000 people, mainly Hutu, fleeing into neighbouring Rwanda with tales of army reprisals against many thousands of defenceless peasants.

The Tutsi, a cattle-herding people, have lorded it over Hutu farmers in the fertile, well-watered lands at the northern end of Lake Tanganyika since pre-colonial times. Rwanda has a similar tribal make-up but the Rwandan Hutu overthrew Tutsi domination at the end of Belgium's colonial rule.

UN says big bout of tribal bloodletting in Burundi took place in 1972 when the Tutsi responded to a Hutu challenge with mass slaughter and the death toll was put by foreign experts at 100,000 or more.

Officials and UN refugee workers on the Rwandan side of the frontier have heard countless horrifying stories of the army massacring from the 35,000 Burundians who have fled north across the Akanyaru River.

Mr Code Classe, representative in Rwanda of the UN High Commissioner for Refugees, toured the border area at the weekend and said: "We cannot talk about a civil war because only one side is armed. It has become a massacre by the Burundian army."

The Tutsi dominate the central African state's politics and army. The Hutu make up 85 per cent of the population.

The killing has sent 35,000 people, mainly Hutu, fleeing into neighbouring Rwanda with tales of army reprisals against many thousands of defenceless peasants.

The Tutsi, a cattle-herding people, have lorded it over Hutu farmers in the fertile, well-watered lands at the northern end of Lake Tanganyika since pre-colonial times. Rwanda has a similar tribal make-up but the Rwandan Hutu overthrew Tutsi domination at the end of Belgium's colonial rule.

UN says big bout of tribal bloodletting in Burundi took place in 1972 when the Tutsi responded to a Hutu challenge with mass slaughter and the death toll was put by foreign experts at 100,000 or more.

Officials and UN refugee workers on the Rwandan side of the frontier have heard countless horrifying stories of the army massacring from the 35,000 Burundians who have fled north across the Akanyaru River.

Mr Code Classe, representative in Rwanda of the UN High Commissioner for Refugees, toured the border area at the weekend and said: "We cannot talk about a civil war because only one side is armed. It has become a massacre by the Burundian army."

The Tutsi dominate the central African state's politics and army. The Hutu make up 85 per cent of the population.

The killing has sent 35,000 people, mainly Hutu, fleeing into neighbouring Rwanda with tales of army reprisals against many thousands of defenceless peasants.

The Tutsi, a cattle-herding people, have lorded it over Hutu farmers in the fertile, well-watered lands at the northern end of Lake Tanganyika since pre-colonial times. Rwanda has a similar tribal make-up but the Rwandan Hutu overthrew Tutsi domination at the end of Belgium's colonial rule.

UN says big bout of tribal bloodletting in Burundi took place in 1972 when the Tutsi responded to a Hutu challenge with mass slaughter and the death toll was put by foreign experts at 100,000 or more.

Officials and UN refugee workers on the Rwandan side of the frontier have heard countless horrifying stories of the army massacring from the 35,000 Burundians who have fled north across the Akanyaru River.

Mr Code Classe, representative in Rwanda of the UN High Commissioner for Refugees, toured the border area at the weekend and said: "We cannot talk about a civil war because only one side is armed. It has become a massacre by the Burundian army."

## Skies grow clearer over Cyprus

"THIS WILL not be a repeat of 1965." The phrase, half statement, half incantation, recurs on the lips of officials cautiously assessing the chances of success of the UN-led Cyprus peace talks scheduled to resume after a three-year break in Geneva tomorrow.

The key participants will be Mr George Vassiliou, elected president of Cyprus last February by the island's Greek-Cypriot majority community, and Mr Raouf Denktash, leader of the Turkish Cypriots.

The latter unilaterally declared an independent state in 1983 in the northern third of Cyprus occupied by Turkish troops. This state is recognised only by Turkey, which sent its troops to Cyprus in 1974 following a Greek junta-led coup against the government of Archbishop Makarios. The Turkish intervention led to the partitioning of the island.

Restoring the political unity of the Cypriot state is the essence of the problem. In two high-level agreements reached in 1977 and 1979, the two communities took a major step by agreeing that the basis for a settlement should be the setting-up of a bizonal federal republic. Since then, however, negotiations on the details have made no progress.

Memories are still fresh of the last, disastrous, attempt to get the two sides to agree a settlement made by Mr Javier Perez de Cuellar, the UN Secretary-General, in January 1985. The participants at that meeting were Mr Vassiliou's predecessor, Mr Spyros Kyprianou, and Mr Denktash.

The talks collapsed almost immediately, ostensibly over procedural differences but in reality because of key disagreements on issues of substance. Mr Denktash insisted that the two sides immediately sign a UN draft settlement plan sketching out the constitutional and territorial arrangements for a bizonal federal state and then relegate all outstanding issues to joint working groups.

Mr Kyprianou countered that the draft failed to address issues considered vital to a workable settlement by the Greek Cypriots — mainly Turkish troop withdrawal, guarantees for a settlement, and arrangements regarding the right of movement, property ownership and settlement within the state. He called for negotiation on these issues before agreeing to sign any of the tabled documentation.

The past three years have been spent by the Secretary-General trying to repackage the 1985 documents to suit both sides. Not least among the reasons for his failure has been the negative personal chemistry which developed between Mr Kyprianou and Mr Denktash.

Independently of this doomed process, Andriana Ierodiakonou reports as the leaders of the two communities meet in Geneva.

However, the political landscape gradually changed in significant ways. Greece and Turkey, whose relations have been tense since the 1974 Cyprus crisis, unexpectedly warmed to each other when their Prime Ministers met in Switzerland last January and undertook to resolve all differences peacefully.

One month later, in Cyprus, Mr Kyprianou lost presidential elections to Mr Vassiliou, a pragmatic businessman who has injected a new vitality into the moribund peace process.

In the interim, too, Turkey has launched its bid for closer ties and eventual membership of the European Community. Although Turkish officials emphasise that there are limits to the price Ankara will pay to achieve its goal, they recognise that a Cyprus settlement would facilitate the process. Not only is Greece committed to vetting Turkish accession as long as occupation troops remain in Cyprus, but recent European Parliament reports indicate a broader EC concern for Cyprus.

Against this background the two sides

however, the political landscape gradually changed in significant ways. Greece and Turkey, whose relations have been tense since the 1974 Cyprus crisis, unexpectedly warmed to each other when their Prime Ministers met in Switzerland last January and undertook to resolve all differences peacefully.

One month later, in Cyprus, Mr Kyprianou lost presidential elections to Mr Vassiliou, a pragmatic businessman who has injected a new vitality into the moribund peace process.

In the interim, too, Turkey has launched its bid for closer ties and eventual membership of the European Community. Although Turkish officials emphasise that there are limits to the price Ankara will pay to achieve its goal, they recognise that a Cyprus settlement would facilitate the process. Not only is Greece committed to vetting Turkish accession as long as occupation troops remain in Cyprus, but recent European Parliament reports indicate a broader EC concern for Cyprus.

Against this background the two sides

however, the political landscape gradually changed in significant ways. Greece and Turkey, whose relations have been tense since the 1974 Cyprus crisis, unexpectedly warmed to each other when their Prime Ministers met in Switzerland last January and undertook to resolve all differences peacefully.

One month later, in Cyprus, Mr Kyprianou lost presidential elections to Mr Vassiliou, a pragmatic businessman who has injected a new vitality into the moribund peace process.

In the interim, too, Turkey has launched its bid for closer ties and eventual membership of the European Community. Although Turkish officials emphasise that there are limits to the price Ankara will pay to achieve its goal, they recognise that a Cyprus settlement would facilitate the process. Not only is Greece committed to vetting Turkish accession as long as occupation troops remain in Cyprus, but recent European Parliament reports indicate a broader EC concern for Cyprus.

Against this background the two sides

however, the political landscape gradually changed in significant ways. Greece and Turkey, whose relations have been tense since the 1974 Cyprus crisis, unexpectedly warmed to each other when their Prime Ministers met in Switzerland last January and undertook to resolve all differences peacefully.

One month later, in Cyprus, Mr Kyprianou lost presidential elections to Mr Vassiliou, a pragmatic businessman who has injected a new vitality into the moribund peace process.

In the interim, too, Turkey has launched its bid for closer ties and eventual membership of the European Community. Although Turkish officials emphasise that there are limits to the price Ankara will pay to achieve its goal, they recognise that a Cyprus settlement would facilitate the process. Not only is Greece committed to vetting Turkish accession as long as occupation troops remain in Cyprus, but recent European Parliament reports indicate a broader EC concern for Cyprus.

Against this background the two sides

however, the political landscape gradually changed in significant ways. Greece and Turkey, whose relations have been tense since the 1974 Cyprus crisis, unexpectedly warmed to each other when their Prime Ministers met in Switzerland last January and undertook to resolve all differences peacefully.

One month later, in Cyprus, Mr Kyprianou lost presidential elections to Mr Vassiliou, a pragmatic businessman who has injected a new vitality into the moribund peace process.

In the interim, too, Turkey has launched its bid for closer ties and eventual membership of the European Community. Although Turkish officials emphasise that there are limits to the price Ankara will pay to achieve its goal, they recognise that a Cyprus settlement would facilitate the process. Not only is Greece committed to vetting Turkish accession as long as occupation troops remain in Cyprus, but recent European Parliament reports indicate a broader EC concern for Cyprus.

Against this background the two sides

however, the political landscape gradually changed in significant ways. Greece and Turkey, whose relations have been tense since the 1974 Cyprus crisis, unexpectedly warmed to each other when their Prime Ministers met in Switzerland last January and undertook to resolve all differences peacefully.

One month later, in Cyprus, Mr Kyprianou lost presidential elections to Mr Vassiliou, a pragmatic businessman who has injected a new vitality into the moribund peace process.

In the interim, too, Turkey has launched its bid for closer ties and eventual membership of the European Community. Although Turkish officials emphasise that there are limits to the price Ankara will pay to achieve its goal, they recognise that a Cyprus settlement would facilitate the process. Not only is Greece committed to vetting Turkish accession as long as occupation troops remain in Cyprus, but recent European Parliament reports indicate a broader EC concern for Cyprus.

Against this background the two sides

however, the political landscape gradually changed in significant ways. Greece and Turkey, whose relations have been tense since the 1974 Cyprus crisis, unexpectedly warmed to each other when their Prime Ministers met in Switzerland last January and undertook to resolve all differences peacefully.

One month later, in Cyprus, Mr Kyprianou lost presidential elections to Mr Vassiliou, a pragmatic businessman who has injected a new vitality into the moribund peace process.

In the interim, too, Turkey has launched its bid for closer ties and eventual membership of the European Community. Although Turkish officials emphasise that there are limits to the price Ankara will pay to achieve its goal, they recognise that a Cyprus settlement would facilitate the process. Not only is Greece committed to vetting Turkish accession as long as occupation troops remain in Cyprus, but recent European Parliament reports indicate a broader EC concern for Cyprus.

Against this background the two sides

## W German M3 grows less fast

By Andrew Fisher in Frankfurt

WEST GERMANY'S money supply growth slowed last month, but still remained above the target range set by the Bundesbank for this year. Further heavy fund outflows abroad also occurred as investors sought higher returns.

The Bundesbank said that M3, the broad monetary aggregate, rose in July at a seasonally adjusted annual rate of 6.7 per cent over the level at the end of last year compared with 7.4 per cent in June. Its desired range for M3 is 3-6 per cent.

The bank's targets have been overshoot for two years running, mainly as a result of heavy inflows associated with speculation on a rising D-Mark. This year, however, the currency has weakened, especially against the dollar.

The bank switched to M3 this year from its traditional central bank money stock, arguing that this better reflected monetary growth and velocity trends. Central bank money stock is made up of cash in circulation and banks' minimum reserve deposits at the Bundesbank.

The investment outflow in July totalled DM10.9bn (\$3.4bn) compared with only DM0.8bn in June. The higher returns obtainable in foreign markets have prompted heavy movements of funds abroad this year, especially to the US, the UK, Australia, and Canada.

## Turkey aims at 20% inflation

TURKISH Prime Minister Turgut Ozal said yesterday that Turkey was trying to cut its inflation rate of 75 per cent as part of preparations for full membership of the EEC, *Reuters* reports from Istanbul.

"We are aiming to pull inflation gradually down to under 20 per cent by 1991 within a medium-term programme," Mr Ozal said.

Turkey, an associate member of the Community since 1964, applied for full membership in April last year.

Turkey's application has met stiff resistance from several member-states, including Greece, mainly on grounds of its weak economy and human rights record.

## Oslo's tough budget

MR Gunnar Berge, Norway's Finance Minister, yesterday pledged a tough budget for next year, but said that there were clear signs of improvements in the country's oil-based economy.

## Record car sales forecast for W Europe

By John Griffiths

WEST EUROPEAN new car sales this year will reach 12.4m units, a record for the third year, according to a new forecast by statistical group Automotive Industry Data.

Some 12.26m cars were sold in a total of 15 West European markets last year. However, there was a widespread expectation that the industry at the start of this year that 1988 would see a downturn. Instead, sales in the first half of the year were up 5.7 per cent at 6.8m. AID, in its latest study,

concludes that even though a slowdown is likely in the second half, "no sharp dip is expected which could totally wipe out the strong advance of the first half".

AID is predicting particularly strong growth for Spain — sales were up by more than a quarter in the first half — and forecasts a 1m-plus market for the first time.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

— sales were up by more than a quarter in the first half — and forecasts a 1m-plus market for the first time.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

AID Newsletter, 34 St John Street, Lichfield, Staffs, England WS13 6PB. £240 per 24 issues.

## Yugoslavs agree the medicine but not the regimen

Judy Dempsey describes the rival treatment methods which are being prescribed for a sick economy

YUGOSLAVIA'S fragile political and economic system suffered another blow at the weekend after thousands of Serbs and Montenegrins demonstrated against alleged persecution of their fellow Slavs in the autonomous southern province of Kosovo.

Kosovo, which is constitutionally linked to the republic of Serbia, was the scene of bitter nationalist riots in 1981. During that stormy period, the largely ethnic Albanian population called in vain for the province to be given the status of a republic.

However, today, the combination of a deteriorating economy in one of the country's poorest regions and the growing number of Serbs leaving the province largely for economic reasons, has heightened the sense of instability.

Economists now believe that one of the ways out of the deepening crisis, which is increasingly triggered by nationalism, is through implementing radical economic reforms.

Surprisingly, in a country where consensus is almost impossible to attain, the medicine being prescribed by party officials and economists to the Yugoslav economy is the same. However, while some senior politicians want the patient to remain in bed for most of the time, others believe it is only by walking without crutches that the patient will gain

strength. It is this crucial difference which, in the view of Slovene politicians and economists, make or break Yugoslavia's ability to pull the economy out of its worst post-war crisis.

The difference in the economic therapy is most apparent in the two special commissions which are looking at ways to reform the economic system. One is headed by Mr Branko Mikulic, the beleaguered Prime Minister, the other by Mr Slobodan Milosevic, the tough Serbian party leader.

They both believe that what is needed is a reform of prices, an overhaul of the management of enterprises, and radical changes in legislation to attract foreign and private investment. The crucial difference is how such reforms will be implemented.

The Mikulic commission believes that only through increased political and economic decentralisation can reforms have any real bite. This would mean allowing enterprises greater financial independence. It would also mean that managers could look for outside investments. Above all, private enterprise, including agriculture, would be expanded, and enterprises would be allowed raise private capital.

"We have to let the economy breathe," says Professor Alex

ander Bajt, a respected Slovene economist. "We are in desperate need of private investments from inside the country and abroad. But first we have to make our enterprises attractive and free of the state before we can do this."

He has been trying for the best part of 30 years to gain support for his reformist views. While he has little problem persuading Slovene party officials that decentralisation across the board will give the economy a much-needed lift, some of the other republics shudder at, and openly resist, his views.

"In a recent report, the Yugoslav economy was compared to Portugal, Spain, Greece and Turkey," he says. "It was found that the efficiency of Yugoslav investments amounted to only 70 per cent of the average efficiency of all these four countries. With that kind of record, who I ask you, is going to invest in our enterprises?"

The Slovenes, along with their more prosperous neighbours, including the republic of Croatia and the autonomous province of Vojvodina, now argue for a sustained dose of political democratisation and economic liberalisation. Such a view, however, is not shared by the Milosevic commission.

Mr Milosevic is a key player both in the economic reform debate and in the broader con-

text of Yugoslav politics. His commission includes many liberal economists who argue much the same as their colleagues on the Mikulic commission.



## OVERSEAS NEWS

## Burmese cities see new wave of demonstrations

By Richard Gourlay in Bangkok

HUGE anti-government demonstrations were held again yesterday in Rangoon and Mandalay, and other towns, as the Burmese people took to the streets against the appointment last week of U Maung Maung as the country's leader, Rangoon based diplomats said.

The army which two weeks ago suppressed similar peaceful demonstrations by shooting into crowds, was positioned throughout Rangoon but did not interfere with the demonstrators. Many people kept away from work and one diplomat said that Rangoon had, in effect, ground to a halt, adding that reliable information, like some other items, was becoming a scarce commodity.

Demonstrations in Mandalay were even bigger than in the capital where army control was much tighter in the run-up to the Burma Socialist Programme Party's appointment of U Maung Maung.

According to repeated but unconfirmed reports, large numbers of people set out to march the 60 km from Mandalay to Rangoon and some reports said the army had fired on the column, diplomats said.

Diplomats have become virtually the only reliable source of information but have to give 10 days' notice before leaving Rangoon for the countryside.

The strong response to the students' call for demonstrations yesterday suggests that many Burmese want the overthrow of the one-party system, dominated by the army and the Party, not just that of a party leader like U Maung Maung.

Gen Ne Win who led Burma for 26 years ago until resigning last month is still widely seen to be pulling the strings behind U Maung Maung. Whether a real overhaul of the system is in the offing, it is hard to see how the Government can regain control of the country, diplomats said.

"The Government does not look like anything right now," one diplomat said. "There have been no appeals, no news, just silence."

Soldiers yesterday sat on the ground, cradling rifles as roars of applause greeted speech after speech from lawyers wearing court robes, and doctors in white coats outside Rangoon General Hospital. A short way away, even larger crowds gathered outside the American embassy.

## Housing shortage that can destroy friendships

K. K. Sharma, in New Delhi, reports on how India's high rents have hit the middle classes

MR Seed Nagvi is a prominent editor in New Delhi whose wife insisted 12 years ago that he build a low-cost house on a cheap 500 sq m plot he had acquired under a scheme for a journalists' colony. Mr Nagvi borrowed heavily to build his dream house but was transferred to Madras. He rented out the house for a pittance to his best friend on condition he would get it back on his return to New Delhi.

The 20-year-old friendship collapsed the day Mr Nagvi returned to Delhi and tried to live in his house. The friend simply refused to move out and the two have been fighting a bitter battle in court ever since. The friend is embarrassed but he draws comfort from the fact that he is among the hundreds of thousands of tenants who have preferred to stay on in houses they rented cheaply years ago rather than look for new accommodation that would today cost them up to 20 times more, if they found it at all.

The picture is much the same in the Bombay suburb of Thane. Mr Subhash Chandra is a Punjabi migrant with a relatively well-paid white-collar job who lives in a tin shack with his wife and three children in a shanty colony with no sanitary facilities or water supply. He has only just enough electricity to operate his television set and video cassette recorder.



Professionals, and their video recorders, are being forced into slum areas such as this in Bombay

The shanty costs him 3,500 rupees (about \$250) a month and lies in the shadow of fashionable high-rise residential buildings where flats cost as much as 600 rupees per square foot, a figure beyond his means.

In Bombay and Delhi, as in

most urban concentrations in India, it is next to impossible to rent residential accommodation because of a severe housing shortage that officials helplessly acknowledge can only worsen.

Rent control laws that operate in favour of tenants mean that flats in Bombay are virtually impossible to rent and are

available for outright sale at prices ranging from 600 rupees to 2,500 rupees per square foot, well out of the range of most people.

Countrywide, the housing shortage will reach a staggering 29.2m dwellings by 1990 according to Ministry of Urban Development estimates. Of this, 22.3m will be in rural

areas. The housing shortage is thus not limited to a few metropolitan areas but affects the entire country. The result is that shanties have proliferated.

The main reasons for the problem are the rapid increase in population, the fast rate of urbanisation, inadequate addition to the housing stock owing to rising prices of land and construction materials and inadequate investment in housing.

Because of high poverty levels and unemployment in villages, towns and cities act as employment magnets so that there is a constant and unending flow of migrants to towns.

The supply of homes has not kept pace with the demand. In real terms, the housing stock has increased from 79.2m in 1961 to 11.4m in 1981, whereas households have gone up from 83.5m to 122.6m in the same period.

The problem is compounded by the demand for commercial and office accommodation for which companies are willing to pay inflated rents. Such is the pressure on the limited land available in all towns that the authorities have been forced to relax the ceilings on heights of high-rise buildings. Indian towns are thus fast becoming concrete jungles of the kind in Western countries.

To encourage house-building, the Government last February presented a package of

incentives in its annual budget to encourage investments in residential buildings and lower the costs of doing so. Apart from urging people to go in for low-cost housing, the finance minister reduced the duty on cement and fly ash bricks and withdrawn the duty on lympha, a cement substitute. This was accompanied by fiscal incentives. Finance companies have been given income-tax concessions for loans for housing while investment in housing will now get larger deductions for income-tax purposes.

The Government has also recently published a detailed draft on national housing policy enunciating the long and short-term objectives of a comprehensive shelter policy and strategies for the development of housing. But the policy does not say where the 1,500bn rupees required for housing by the turn of the century will come from.

The Government statement admits: "the problems are gigantic. Unless definite and bold policies are evolved and implemented, the country will not be able to meet the basic minimum need of the population for shelter even by the turn of the century." The policy statement in effect admits the Government's helplessness and has been widely dismissed as rhetoric. It is more than likely that for most Indians, a roof will mean a leaking hut

## Hawke shuffles four of his Cabinet ministers

By Chris Sherwell in Sydney

MR BOB HAWKE, the Australian Prime Minister, yesterday announced four Cabinet changes following last week's resignation of Foreign Minister Bill Hayden to take up the post of Governor-General.

Senator Gareth Evans, 43, was named new Foreign Affairs Minister, while Mr Ralph Willis, currently Industrial Relations Minister, will take over Sen Evans' position as Minister for Transport and Communications. Mr Peter Morris moves up to Industrial Relations.

The fourth significant change sees the demotion of the veteran Mr Clyde Holding from the increasingly sensitive position of Immigration Minister. He has been replaced by

Senator Robert Ray, a powerful figure in the dominant right-wing faction of the ruling Labor party.

Mr Hawke announced the changes sooner than expected, apparently to avoid protracted speculation. The appointments take effect in two weeks' time.

Sen Evans is both energetic and articulate, but outspoken. An academic lawyer and barrister before entering the Australian parliament in 1978, he was made Attorney-General when Labor came to power in 1983. He was shifted to Resources and Energy in 1984 and for the last 13 months he has headed the new super-ministry of Transport and Communications.

## Shamir benefits from uprising

By Andrew Whitely in Jerusalem

A SPATE of Jewish-Arab violence in previously untroubled parts of Israel has brought many Israelis face-to-face with the Palestinian *intifada* for the first time, and strengthened Prime Minister Yitzhak Shamir's bid to win the November general election.

The right-wing leader never loses an opportunity to remind whoever is listening of his belief that the disturbances in the occupied West Bank and Gaza Strip are only a first stage in an Arab grand design to destroy Israel and drive the Jews into the sea.

Saturday's grenade attack on a crowded pedestrian arcade in the centre of Haifa - a mixed-race city which prides itself on its good intercommunal relations - was a nightmare waiting to happen.

An eight-year-old boy, with his family outside a toy shop, had his leg blown off and 24 others were injured; but the toll could have been much worse. Responsibility for the Haifa attack was claimed by the extremist Abu Nidal faction of the PLO.

At Sunday's Cabinet meeting, Police Minister Haim Bar-Lev reported that over the week there had been 89 politically-motivated incidents reported inside Israel's pre-1967 "green line" borders - up from 75 the week before.

The Haifa grenade incident will convince many Israeli waverers that it is Prime Minister Shamir and not his Labour rival, Mr Shimon Peres, who is right about the Arabs. Only firm resolve in the face of Arab "impudence", and a

readiness to hit back hard, will make them come to terms with us, runs the conventional Israeli wisdom.

The Haifa attack was the second electoral gift for Mr Shamir recently. The first, King Hussein of Jordan's decision to abdicate from the West Bank, left Labour's foreign policy for the election in ruins.

No longer able to claim that "a Jordanian option" still exists for Israel, Labour has been compelled to cobble together a strategy of dubious credibility. It boils down to a willingness to talk directly to local Palestinians about an interim solution for the West Bank and Gaza Strip, while keeping King Hussein on ice for a permanent settlement of Israel's eastern border.

## Islamic militants seek to lead West Bank protest

By Andrew Whitely

A DETERMINED attempt by the fundamentalist Islamic Jihad movement to set the pace of the uprising in the Israeli-occupied West Bank is worrying many Palestinians and causing concern to the Israeli authorities.

Islamic Jihad is the dominant influence in the Gaza Strip, and until recent days has been an uneasy partner in the so-called Unified Leadership of the Uprising, together with the PLO and the more moderate Communists. A strike called on Sunday by the religious faction, and opposed by the PLO, may, however, mark the separation of their ways.

Significantly, the Islamic Jihad militants chose an anniversary of greater importance

to themselves than their erstwhile partners - the 19th anniversary of a celebrated arson attempt on Jerusalem's Al Aqsa Mosque - to show their hand. While there was much initial confusion among shopkeepers and workers travelling to their jobs in Israel, the strongarm tactics of the fundamentalists got the message across.

As the leadership contest emerges into the open, West Bank Palestinians yesterday entered their fifth day of strike action.

The army once again slapped a curfew on Nablus, the West Bank's largest city. Six Palestinians were reported shot and injured during the day.

## Korean talks break down

By Maggie Ford in Panmunjom

TALKS between the two Koreas, the first for three years, broke up yesterday with no agreement or firm date for a further meeting. Neither side was prepared to give ground on the subjects for discussion at a full parliamentary meeting, after three days of talks at the border village of Panmunjom.

The North, dispirited by the lack of progress, appealed to the South to recognise the new world realities between the superpowers and a growing desire for reunification in both halves of the peninsula. Now was the time for a fresh attitude, but the South seemed only interested in discussing the Olympic Games, the delegation leader said.



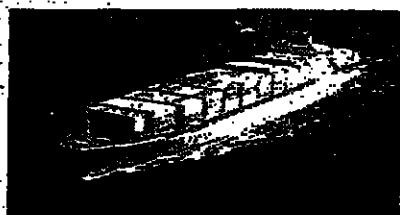
## How to "K"eep Ahead in Shipping.

Keep counting on "K" Line, the company that developed containerization in Japan and still holds the lead. Our 200 ultramodern ships - with a 10 million-ton capacity - ply 30 global routes linked by a highly efficient system.

Our computerized documentation system that minimizes paperwork and speeds up the issuance of necessary documents. And our on-line container-inventory system that pinpoints your cargo's location at all times - and collects product-related marketing/distribution data worldwide to help us pioneer new containerization methods and new routes.

"K" Line works independently or in tie-ups with consortiums to give you more space and frequency. We also combine different modes of transportation to get your cargo door to door. We handle any kind of cargo all the way with one B/L to cover everything.

Keep ahead. Count on "K" Line. Fast. Efficient. Always dependable - as we've been for nearly 70 years.



Your bridge to better business

• Containerships • Specialized Carriers • Car Carriers • Tankers • LNS/LPG Carriers

General Agent in Europe: Kawasaki (Europe) Ltd. London Phone 01-585-6221

Agent in U.K.: Carpath Maritime Agencies Ltd. London 0709-76531 Fax: 030-427-4426

Hamburg: IBA Internationale Schiffsverkehrs Agentur GmbH Phone 3296296 Amsterdam: Best & Osterlath N.V. Phone 03-2342850

Rotterdam: Compagnie des Schepers' Maatschappij B.V. Phone 10-4288911/Amsterdam 20-148822 La Havre: J.M. Currie & Co. 35-228181



**K LINE**  
KAWASAKI LINE

## THE BRITISH BANK OF THE MIDDLE EAST LEADS THE WAY IN SOPHISTICATED BANKING SYSTEMS.

As one of the Arab world's most successful banks, we at The British Bank of the Middle East have been investing in ever more sophisticated

technology for more than ninety years now.

At the same time, we've always realised that all of the information and communication systems in the world are useless without the human resources needed to operate them effectively.

Consequently, we've always been as committed to the development of our staff as we have to the development of our banking systems.

It's a commitment which enables us to offer an unrivalled range of financial services to meet the needs of the region. And leaves us perfectly placed to help you profit by our experience.

Backed by the vast resources of the HongkongBank group, we also offer you direct links to more than 1,300 bank offices in 55 countries.

Not forgetting, of course, the full benefits of almost a century's professionalism, integrity and trust.

The British Bank of the Middle East  
البنك البريطاني للشرق الأوسط



member: HongkongBank group

Bahrain India Jordan Lebanon Oman Qatar Switzerland United Arab Emirates United Kingdom

London Branch: Falmes House, 100 Cannon Street, London EC3A 3DF, Tel: 01-4534311-7



## AMERICAN NEWS

# US bomber may need \$8bn boost says Congress

AMERICA'S troubled B-1B bomber may require \$8bn in improvements to boost its ability to carry nuclear weapons deep into the Soviet Union, a congressional report said yesterday. Reuter reports from Washington.

The Congressional Budget Office (CBO) told the House Armed Services Committee lawmakers will have to decide in the next few years whether to spend substantial additional funds on the strategic swept-wing bomber.

The B-1B, built by Rockwell International, was designed for tree-level penetration missions. But the Air Force has admitted its electronic counter-measures system may not be able to jam and confuse Soviet radar.

"If all enhancements currently under consideration are pursued, that package could cost as much as \$8bn," the CBO said of Air Force plans to improve the radar-jamming and also add other equipment to the aircraft.

The Air Force, which bought 100 advanced B-1Bs at a cost of about \$20.5bn, says it expects to correct the jamming problems but has not given a cost. "It would be unrealistic to provide a cost figure while we are still assessing options on the defensive avionics," the Air Force said yesterday.

The CBO report did not

break down the cost of fixing the radar jamming equipment, but said its estimate also included tentative Air Force plans to add missiles to knock out Soviet defences and to improve radar and communications equipment.

"Over the next few years, the Congress will have to decide whether to invest substantial additional monies in the B-1B bomber programme to enhance the aircraft's ability to penetrate Soviet air defences and to make it useful in a wider range of combat missions," the report said.

Mr Les Aspin, chairman of the Armed Services Committee and a Wisconsin Democrat, said in a statement that the Air Force would have to make a strong case to sink additional billions into the B-1B.

"The report adds another voice to those pointing out the shortcomings of one vital part of the bomber's performance," he said, "concerning its defensive electronics," Mr Aspin said.

"The counter-measures work well against some enemy radar threats, but CBO points out that the basic design is fundamentally flawed. We have to decide first if it's worth it to fix the B-1B's problems, and then we have to decide what, if anything, to do about the expected Air Force requests for enhancements," Mr Aspin said.

## Six charged over plan to attack Nicaragua

SIX Cuban-born Americans were yesterday charged with training and equipping commandos at a Florida base camp for operations against Nicaragua's Sandinista troops, Reuter reports from Miami.

According to the indictment, the six operated a training camp on the outskirts of the Everglades near Naples on Florida's west coast from June 1983 until September 1986, turning out about 60 graduates in commando-style warfare.

Mr Mark Schnapp, head of the criminal investigations division of the US attorney's office here, said that the men, mostly Cubans and Nicaraguans, were flown to Costa

Rica to join forces with forces under Mr Eden Pastora, the former Contra rebel leader.

The six are charged with violating the US Neutrality Act, which prohibits private individuals from engaging in warfare against a country with which the US is not at war. They face between six and 30 years in prison if convicted.

"You just can't do that sort of thing," Mr Schnapp said, adding the operation was "not sanctioned by any US government agency." Four of the six had agreed to surrender and arrangements were being made for the other two to give up, Mr Schnapp said.

## Kabul tops US state terrorism list

By Lionel Barber in Washington

THE Soviet-backed regime in Afghanistan repeatedly attacked civilian targets in Pakistan in 1987 and was responsible for well over half the incidents of worldwide state-sponsored terrorism, a US State Department report said yesterday.

The report was completed before last week's incident in which a Pakistani C-130 transport plane crashed killing President Zia Ul-Haq, the US ambassador, the chief US military attaché, and most of the Pakistani military high command.

The Pakistani government has said it believes terrorists were responsible, and a US official has said that Afghan agents are among the suspects "because of the Kabul regime's attacks against Pakistan, which serves as a base for the US-backed Afghan rebels."

The State Department report - entitled Patterns of Global Terrorism: 1987 - said Afghan agents carried out 127 of the 189 incidents last year attributable to state-sponsored terrorism. Iran was second with 44 and Libya followed with seven, the report said.

A US official cautioned that the number of Afghan incidents was high because they were directly linked to the civil war in Afghanistan.

The official added that the apparent curbing of Libya's involvement in state-sponsored terrorism was not necessarily correct. He said the Reagan Administration suspected that Col Gaddafi's regime was increasing its activities and may have been involved in the terrorist attack on a cruise ferry in Poros, Greece this year. "The Libyans are just hiding their hand better," the official said.

The report said that the Soviet-trained secret police in Afghanistan, called the Khab, had conducted 127 such attacks, killing 234 people and wounding 1,200.

About half of all the deaths and injuries worldwide attributable to state-sponsored terrorism occurred in Pakistan in 1987. In total there were 832 international terrorist incidents.

# Latin America fails to lure the UK

Robert Graham on why Mrs Thatcher has never made a formal visit to the continent

LATIN Americans have a reputation for staying up late. Thus it was suitably symbolic that Britain's House of Commons should debate the affairs of Latin America in the early hours of the morning.

To be precise the debate took place on July 28 from 02.51 until 04.21 when time ran out in favour of discussing the Environment. It is worth being precise because this was the first time since May 26, 1950 that the Commons has held a general debate on Britain's relations with Latin America.

That only one and a half hours should be devoted to this subject, ignored for 38 years and squeezed into business at a moment of least attendance in the final session before the holiday recess, is eloquent testimony of where Latin America lies in the list of British Government priorities.

This is not just a phenomenon of the Thatcher Government. It visits by Foreign Ministers and Prime Ministers are crude gauges of strategic importance, national interest, export promotion, cultural links and historic ties, then British Governments post-1945 have merely varied between benign neglect and indifference.

Latin America has received the least official attention of any region.

As Mr Jacques Arnold, Conservative MP for Gravesend, said initiating the debate: "So

often foreign affairs debates in this place centre strategically on East-West relations, fashionably on Europe, nostalgically on the Commonwealth and indifferently on the remainder."

In such a climate it is not surprising therefore that no Prime Minister has formally visited Latin America (the closest was Mrs Thatcher's presence in 1981 at the Cancun, Mexico North/South summit). The first visit by a UK Foreign Secretary was not until 1986.

Britain's historic interest in the region has been commercial and financial, and such neglect basically reflects the decline of trade with Latin America. In 1945 almost a quarter of Latin America's trade was with Britain but by the 1970s the percentage had fallen to 2 per cent. Today Britain's trade with the entire continent of Latin America (which contains 8 per cent of the world's population) is roughly on a par with Denmark.

The decline in British commercial interest began almost at the turn of the century but has accelerated post 1945 as a result of a combination of several factors - the UK's concentration on Europe; the special relationship with the US and the perception that Latin America is a US sphere of influence; the emergence of colonial ties outside the Caribbean; the lack of strategic



Chalker: more Spanish

interests; the declining role of sterling and changing trade and investment patterns within Latin America; and the psychological barrier caused by dealing with Luso-Hispanic culture.

The Commons debate went over all this ground and a good deal more. Those on the Conservative Government side (all three of them) wanted to draw attention to this neglect and promote greater interest and involvement to take advantage of the economic opportunities in Latin America. Those on the opposition Labour bench (only two speakers) were in sympathy but really wanted to talk about the achievements of the Sandinista revolution in Nicaragua and the human rights abuses of the Pinochet regime in Chile. Tacked onto the end of the debate was an incon-

plete attempt to discuss the long term implications of Britain's policy towards the Falklands.

This mixture with reasonable accuracy the two levels of concern in Britain today about Latin America. Businessmen, bankers, diplomats, academics and the odd politician are concerned that Britain is missing out on commercial and investment opportunities.

Then there is a sub-culture of well organised issue-orientated groups (essentially of the Left) anxious that British policy should be more committed to such causes as the Sandinistas in Nicaragua and the anti-Pinochet movement in Chile.

Although the Commons debate could not have been held at a less auspicious hour, its occurrence provides a marker. It should be seen less in the context of previous neglect, and much more against a background of awareness of Latin America's economic base in the debt crisis, the Falklands conflict, wars and revolution in Central America, the multiple problems of the illegal drugs business and ecological issues like the fate of the rain forests have created a new consciousness of the region that is slowly - very slowly - filtering into government attitudes and policy. The trend for British trade has also begun to recover from the

trough in the 1970's so that it now accounts for some 3 per cent of commerce with Britain. Mrs Thatcher's critics maintain she has identified Britain too closely with US policy in the region especially over Central America. However, under her administration both the Foreign Secretary and junior ministers have toured the continent to an unprecedented degree. This has been motivated primarily by self-interest: a diplomatic damage limitation exercise in the wake of the Falklands.

So long as conflict with Argentina is a possibility such considerations persist. Yet a momentum has been established for broader based contact which now calls for the symbolic gesture of a prime ministerial visit to demonstrate Britain's seriousness in Latin America.

Symbols apart, the Commons debate highlighted the need for better and more extensive tuition of Spanish and Portuguese in schools to create a more solid long-term base for ties with Latin America.

Mrs Lynda Chalker, the junior government minister, who spoke in the debate, admitted as much: "But we shall be truly effective only if our people can trade in the language of the countries - that means Portuguese and Spanish being spoken by our businessmen, let alone being taught in our schools."

## Argentine metal workers win 47.4% pay increase

By Gary Mead in Buenos Aires

ARGENTINA'S powerful metal-workers' union (UOM) has negotiated a 47.4 per cent pay increase on basic wages, defying Government attempts to limit pay settlements.

The Government considers the rise excessive, and has called on the UOM and employers to reconsider. With 320,000 members, the UOM is the largest union and sets the pace for other unions' wage demands.

A joint statement issued by the ministries of Labour and Economy described the wage deal as being outside current guidelines. However, there are no real guidelines apart from Government exhortations to

exercise responsibility in wage demands.

The agreement covers the period August 16 to September 16. On September 12 - after August's predicted inflation figure of 30 per cent will be officially known - the UOM will put in another pay claim to cover the next month.

At the beginning of August the Government introduced a series of economic measures aimed at correcting the worsening economic crisis.

The rising tide of monthly inflation rates peaked in July at 25 per cent during difficult negotiations with the International Monetary Fund.

## Trinidad opts for austerity

By Canute James in Kingston

FACING A rapid deterioration in its oil-based economy, the Trinidad and Tobago government has introduced substantial cuts in spending which are expected to raise the ire of the trade unions and increasingly restive public servants.

The cuts were announced after last week's 15 per cent devaluation of the country's currency following a depletion of foreign reserves.

Mr Ray Robinson, Prime Minister and Finance Minister of the English-speaking Caribbean republic of 1.1m people, has announced 50 per cent cuts in this year's TT\$2.5bn (\$400m) capital budget, and a five per cent reduction in the TT\$5bn recurrent budget.

The cutbacks, and other au-

usterity measures being implemented, will reduce the popular base of Mr Robinson's administration which took office 20 months ago with a handsome victory in general elections. "It is imperative that we put our fiscal house in order," Mr Robinson said. "The government just cannot keep spending more than it earns."

Salaries are to be cut, as will subsidies to state companies, while petrol prices have been increased to help close a projected TT\$587m revenue shortfall. The Prime Minister is anticipating closures and mergers of troubled state companies, some of which are being considered for divestment.

The measures represent the latest attempt by the government to contain the damage to the economy caused by the collapse in the price for oil. The petroleum sector is the main pillar of the economy, but its contribution to the gross domestic product has declined from 40 per cent in 1980 to 20 per cent last year.

Reduced earnings from oil led to a TT\$900m deficit on the current account of the balance of payments last year. Foreign reserves stood at \$125.7m at the end of March, after declining steadily from \$2bn at the end of 1983, with the economy contracting by 4.9 per cent last year following a 5.5 per cent fall in 1986.

## WORLD TRADE NEWS

## Hungary and Israel set for stronger links

By Judy Dempsey in Vienna

TRADE between Hungary and Israel looks set to rise sharply over the next year following the visit earlier this month of a high-level team of Hungarian economists and trade officials to Jerusalem.

The visit, headed by Mr Istvan Szabo, the chairman of the National Council of Agricultural Co-operatives and manager of the highly successful Red Star co-operative farm, forms part of Hungary's cautious strategy of improving relations with Israel.

Except for Romania, all the countries of Eastern Europe broke off relations with Israel after the Six-Day War in 1967. But over the past two years there has been growing speculation, confirmed by trends, that Hungary, Poland and Yugoslavia are now anxious to use economic contacts as one means of gradually improving, if not eventually normalising, relations.

The visit by the Hungarian delegation to Israel seemed to bear this out.

During talks with Israeli trade officials, Mr Sandor Demjan, chairman of the newly-formed Hungarian Credit Bank, said the Hungarian authorities were seeking joint ventures and a "major increase in trade".

In particular, he said Hungary was interested in acquiring "advanced industrial technology" for irrigation systems, cattle breeding, dairies and animal feed production.

But it is the dramatic increase in bilateral trade over the past year which shows the extent of the improving relations between both countries.

During the first half of 1988, Hungarian exports to Israel totalled \$9m, an increase of about \$1m for the whole of 1986. In 1987, exports to Israel topped \$13m. The exports consist largely of farm produce,

basic chemicals, electricity and engineering goods. The trade is far from one-way. Israeli exports to Hungary, which include food processing equipment, reached \$5m during the first half of 1988 compared with \$8.6m for 1987.

During the visit, Mr Demjan said he thought trade could easily be quadrupled and reach \$100m. The figure could even be higher. But because Hungary has no diplomatic relations with Israel, goods going in both directions are subject to import duties of between 15 and 45 per cent.

In a surprisingly frank assessment of bilateral contacts, Mr Demjan said that "the move by Hungary to break off relations in 1967 was a mistake with adverse effects on economic relations".

In a separate development, Malev, the Hungarian state airline, and El Al, the Israeli national airline, are holding talks in Budapest about establishing a Warsaw-Budapest-Tel Aviv flight.

Meanwhile Poland, which with Hungary, opened "interest" offices last year in Tel Aviv, also wants to expand bilateral trade contacts with Israel.

In June, Mr Josi Beilin, the Political Director-General of the Israeli Foreign Ministry, held talks in Warsaw with Polish officials. Discussions are also taking place about opening an air link between Warsaw and Tel Aviv. At present, only Romania and Adria Airways of Yugoslavia run regular flights to Israel.

For their part, the Yugoslav authorities recently confirmed that El Al would begin direct flights to Belgrade in the late autumn, thus paving the way for facilitating trade and tourism links between both countries.

## Peking invests more abroad

FROM real estate in Florida to chickens in Australia, China is investing more abroad in a move diplomats and economists say is a sign of its growing role in the world economy, Reuter reports from Peking.

Earlier this month, Peking's oil trading arm, Sinochem (China National Chemicals), bought 50 per cent of the US West Coast oil refining operations of Coastal Corp CGP.

Sinochem did not give the price it paid for its stake, but for China it was a major step. "This is another indication that the former Maoist ideological concerns are much less prominent," said a Western diplomat.

Under the late Mao Tse-tung, China sought self-reliance, spurning economic aid and investment from the West and aiming to keep business links with the capitalist world to a minimum.

In 1978, China's leaders began a series of economic reforms, adopting ideas once shunned as capitalist to spur their crumbling economy.

Peking has actively courted foreign capital and technology but has only more recently seen opportunities abroad.

"They (China's leaders) are hoping that they will acquire skills and capital that eventually will be useful in China," said a foreign economist.

A recent commentary in the official Communist Party newspaper, the People's Daily, said: "Investing abroad is in fact a way to make use of foreign capital."

A second diplomat said other benefits from overseas investment were a higher return on capital than in China and the opportunity for officials to go abroad.

Officials said a total of \$36m of investments overseas were approved in the first half of this year. Among China's most prominent investments abroad was the purchase of a 12.5 per cent interest in Hong Kong-based Cathay Pacific Airways by one of its most active companies, China International Trust and Investment Corp. CITIC alone has some 18 projects abroad, from a real estate venture in Florida to stakes in an aluminium smelter in Australia and a pulp plant in Canada.

## Helsinki pays for Finnish export success

Olli Virtanen reports on concerns over Finland's huge trade surplus with Moscow

FINLAND'S huge trade surplus with the Soviet Union and increasing concern about a possible devaluation of the overvalued ruble have prompted a new system between the two countries under increased strain and criticism.

Often dubbed the "Japan of Europe" for its fast growth, Finland now knows the pains of export success. The country has to finance the bulk of the FIM3.2bn (\$1.15bn) trade surplus with the Soviet Union while the Finnish authorities have cut practically all exports to Moscow in order to reduce that surplus.

It is oil that keeps the engine of Finnish-Soviet trade running smoothly. And any disturbance affecting the supply or price of oil causes severe problems.

In short, the falling price of crude oil imports from the Soviet Union has brought the two-way exchange of goods down from the peak of FIM3.8bn in 1983 to FIM2.8bn last year and to FIM1.3bn during the first six months of 1988. Meanwhile, Moscow's share of Finland's external trade has plummeted from 36 per cent in 1983 to 13.8 per cent during the first half of this year.

The collapse has wrought havoc in more industries than notably in building, which traditionally sells almost two-thirds of its output to the Soviet Union. The smaller footwear and textile industries, which export 70 per cent and 30 per cent respectively of their total production to the Soviet Union, have also suffered badly.

The problem, however, has been a flood of export orders from Moscow. The drop in the world market price of oil may have brought a decline in Soviet imports, but it did not automatically cut Finnish exports. Consequently Finland has stacked up a huge

current account surplus of FIM5.2bn in unconvertible currencies.

That, of course, is just a book-keeping figure. The money ever changes hands in the bilateral trade. Payments are settled in the administrative "clearing rouble" and they are cleared in the Bank of Finland, the country's central bank, and in the Soviet foreign trade bank, Vnesheconombank.

A typical payment transaction to a Finnish exporter would go like this: The Russian buyer orders its bank to send a payment order through Vnesheconombank to the Finnish commercial bank used by the exporter. The Finnish bank, after charging a commission, sends the payment order to the Bank of Finland which, after taking its slice, pays the company in Finnish marks.

Before the exporter can sell his goods to the Soviet Union, he has to apply for a permission from the Finnish License Bureau, which oversees the annual trade agreement. The bureau has now stopped practically all exports to Moscow in order to reduce the surplus by the end of this year.

Some companies are not even able to fulfil their long-term delivery contracts, to the anger of many prominent Finnish businessmen, including Mr Tyyo Pesälä, chief executive of Kemira, the state-owned fertiliser and paints group, who blames the bureau for making Finnish companies seem unreliable in international trade.

The payment orders have piled up at the central bank, boosting its tied currency reserves to FIM2.2bn (\$720m) at the beginning of August, up from FIM1.2bn at the end of 1987. On the top of that there is FIM2bn worth of surplus transferred to a special account on which Moscow pays a 6 per cent interest rate. The tied reserves amount to an

interest free loan to the Soviet Union.

In effect the surplus also subsidises Finnish exporters. The Bank of Finland has ordered more Finnish exporters to their clearing roubles than it gets back in payments from Finnish importers who want to buy clearing roubles in order to pay for Russian products. Thus the central bank, and subsequently the Finnish economy, has to shoulder the "excessive" exports in financing costs. The net effect of the surplus is more difficult to estimate. It has provided work in Finland and helped the country maintain solid growth throughout the decade. But all Finns agree that the situation cannot continue.

Negotiations to correct the balance are about as frequent as trains leaving Helsinki for Moscow. Both parties are very reluctant to cut the volume of trade, which would be the obvious way to correct the imbalance.

Russians and Finns alike also cling to the bilateral trade principle. Russians wish to maintain good trade relations with a producer of Western goods that does not require Western currency. Finland is Moscow's second biggest Western trading partner with 15 per cent of the total, second only to West Germany. The Finnish industry is unwilling to change to the hard currency basis for fear of losing business. They have not forgotten the example of Austria which abandoned the bilateral principle with the Soviet Union and moved over to hard currencies at the beginning of the 1970s. As a result the Soviet Union has used the example to buy most goods elsewhere, leaving Vienna with a considerable deficit in its Soviet trade.

Finland has a similar experience with Poland. Conducted in hard currencies, the trade between the two countries is that competition.

very much lopsided in Poland's favour.

After the Second World War the Soviet Union made bilateral trade agreements with practically all its trading partners, Eastern and Western alike. Today Finland is the only remaining Western country that has the barter pact in use.

Finnish negotiators, particularly the central bank, are adamant that Moscow should pay proper interest on the surplus. Furthermore they wish to insure the surplus against a possible devaluation of the rouble, which is probable if and when Moscow makes its currency convertible.

The value of the clearing rouble fluctuates on a weekly basis, roughly following the dollar, but Finnish exporters regularly hedge their claims with forward agreements. (As another effective way to stop Finnish exports, the Bank of Finland recently denied all forward arrangements in the Soviet trade.) The central bank cannot secure the total surplus against currency fluctuations without a special clause in the clearing agreement.

For the moment, neither party is willing to abandon the cosy trading system. However, perestroika, or restructuring of the Soviet economy, may indirectly bring about changes. Moscow plans to join international organisations, such as the General Agreement on Tariffs and Trade and the International Monetary Fund, which forbid bilateral trade agreements between two member-countries.

While Gatt lacks the leverage to enforce the principle, the IMF can and will stop such pacts. The Soviet Union will face a choice between the IMF and the bilateral trade with Finland. It is clear Helsinki would come second in that competition.

## South Korea to reduce average tariff rates

THE South Korean Government announced yesterday that it will lower average tariff rates on 2,677 items from 18.1 per cent to 12.7 per cent by next year and gradually to 7.9 per cent by 1993, AP-UD reports from Seoul.

The Finance Ministry said the Government will maintain high duties on imports of livestock and farming products, as well as ball bearings and plywood.

The ministry first introduced the tariff reform bill in June, and completed discussions with the Government on the bill yesterday. It quoted the bill's provisions will take effect next year.

The present tariff rates on 320 items, or 12 per cent of the total, 131 livestock and agricultural products, and 54 industrial goods, the ministry said.

The current tariff rates will be maintained for lactose (20 per cent), beef and chicken (30 per cent), milk (40 per cent), garlic, onions and red peppers (50 per cent), and fruit (50 per cent).

The reductions in the tariff rates and a special excise tax are likely to trigger a cut next year in the domestic consumer prices of jewellery, fur, electronic organs, golf equipment, videotape recorders, quality watches, movie projectors, quality cameras, and wine, according to the ministry.

## China economic zone ahead on property policy

AFTER nearly a year of experimenting with free-market tools such as land auctions and tenders, the Government of China's Shenzhen special economic zone has found strong demand for property in the zone, AP reports from Shenzhen.

Shenzhen is moving quickly to translate its experiments into permanent Government policy to make sure this property flows efficiently to eager buyers.

Shenzhen was set up in 1980 to attract foreign investment. So far the zone has restricted its free land market to office and commercial sites and private housing developments.

## Japan may study impact of EC on car industry

JAPAN'S Government and the nation's car industry are expected to set up a study group to assess the possible impact of a unified European Community (EC) market on Japanese motor vehicle manufacturers, a Japanese trade official said yesterday, AP-DJ reports from Tokyo.

The official, at the automotive division of the Ministry of International Trade and Industry (MITI), said the group will look into the "advantages and disadvantages" of such a unified market for Japanese car makers.

He indicated Japan was primarily concerned about the fate of existing restrictions on Japanese motor vehicle exports

to different EC countries and unofficial Japanese restraints on overall shipments to the EC.

Automotive industry officials apparently fear the unified market the EC plans for 1992 may make exporting vehicles from Japan more difficult and costly.

The MITI official said that car makers including Toyota, Nissan, Mazda and Honda are assigning officials in charge of European operations to the study group.

The group is scheduled to hold its first meeting in early September and is planning to meet regularly, the official said.

**Travelling on Business?**

Enjoy reading your complimentary copy of the Financial Times when you're reading...

... in London at the Hotel Cravat, Holiday Inn, Intercontinental Hotel, Hotel President

**FINANCIAL TIMES**  
Europe's Business Newspaper



**If The Independent burnt to the ground  
would the paper go up in smoke?**



The obituary writers might well have their pens poised.

But The Independent cannot be written off that easily.

Not if Commercial Union has anything to do with it.

As well as insuring The Independent building, we have put together a specific policy (in partnership with Bain Clarkson, their broker) to cover the contents.

From the most sophisticated network of computers on which every issue is prepared, to the humble coffee machine.

The very fact that a fire could pull the plug on the whole business is precisely why we provide The Independent with extra cover for what we call 'business interruption'.

In simple terms this means that if the building goes up and sales go down, Commercial Union would compensate for the loss of revenue. As well as the cost of any damage to their property.

So The Independent would survive.

To report on many other burning issues no doubt.



**We won't make a drama out of a crisis.**



## UK NEWS

## Plessey wins fight for Nato defence project

By David White, Defence Correspondent

PLESSEY, the UK defence and electronics group, has won a battle against Cossor Electronics, subsidiary of the US company Raytheon, to lead the British side of a Nato-wide identification project designed to reduce possible confusion between friendly and hostile forces.

Total British contracts, including subcontractors, are expected to be worth about £500m up to the end of the century.

The Ministry of Defence's appointment of Plessey's avionics arm as lead contractor is the last of a series of nominations by major European allies under the Nato Identification System (NIS) scheme.

The project has been under discussion since the early 1970s.

Each country was given responsibility for its own feasibility studies, project definition and development of its own equipment.

The NIS project, which is expected to cost in the region of £10bn overall, is designed to replace current IFF (Identification Friend or Foe) systems, which are regarded as outdated, unreliable and easy to jam.

The UK company is now under instruction to discuss a possible link-up with Siemens, the West German lead contractor, on future work.

Compatibility within West Germany is seen as especially crucial because of the concentration of forces there.

Thomson CSF of France, Italy and Italy and Cessels of Spain have already been appointed to head national programmes under the scheme.

A US contract is currently under competition. The planned new family of systems, for use in the air, at sea and on land, is designed to be more accurate and technologically secure than current equipment, and to be fully "interoperable" within Nato.

Cossor, the main UK supplier for the current Mark 10 IFF system, indicated that it still hoped for a significant share of the business.

Plessey and Cossor were linked at an earlier stage of the project in a joint company, Identification Project Partners.

## Chunnel builder faces penalty for mounting delays

By Kevin Brown, Transport Correspondent

EUROTUNNEL, the Channel Tunnel group, said yesterday that it had issued a formal warning to Transmanche-Link (TML), the construction consortium, over mounting delays.

The warning is the first towards a claim for compensation by Eurotunnel, which claims TML is 13 weeks behind schedule in the UK, and around 12 weeks late in France.

Eurotunnel is a consortium of the Channel Tunnel Group of the UK, and France Manche of France. TML is a joint venture of five British and five French construction groups.

Eurotunnel says TML met its first deadline, for the start of work on the service tunnel from the UK, but started late in France and failed to complete one kilometre of tunnelling on the French side by the agreed date of July 1.

It was "very unlikely" to meet the next deadline, which is for the completion of five miles of tunnelling from the UK by November 1.

Eurotunnel said: "Nothing irreparable has happened yet, but TML are not yet managing the tunnelling programme to our satisfaction, hence the formal notice."

"TML has made changes in

line management, but we wish them to present their plans for sufficient progress to maintain the construction programme."

Eurotunnel said it would claim "advanced liquidated damages" under its contract with TML if the construction consortium failed to meet the November deadline.

This is a fixed sum agreed when the contract was signed. It is intended as a penalty to discourage slow working, rather than an attempt to recompense Eurotunnel for lost income caused by a delay in bringing the tunnel into use.

Eurotunnel refused to disclose the size of the penalty. But the company said: "It is not just peanuts. It is cause for TML to worry. That is why they will have to come back to use with some serious answers."

Eurotunnel said it did not expect the delays to affect its plans to draw the first tranche of its £5bn bank borrowings in the autumn.

Mr Andrew McDowall, chief executive of TML, declined to respond to Eurotunnel's announcement. But "TML released a letter from Mr Alastair Morton, joint chairman of Eurotunnel, warning the consortium not to comment."

## Tighter Ulster security measures under way

By Our Belfast Correspondent and Tom Lynch in London

ADDITIONAL security measures will be taken to combat the IRA in Ulster following the weekend bomb attack which killed eight British soldiers in Tyrone, Mr Tom King, Northern Ireland Secretary, said yesterday.

Mr King, said after visiting survivors of the bombing at the Tyrone County Hospital in Omagh, that the Government would never capitulate to terrorists. "We are reviewing a number of issues. Action will be taken. We will pursue the terrorists in the most effective way we can."

Mrs Margaret Thatcher, the Prime Minister, and Mr King are to meet this week to discuss possible measures. Neither minister gave any hint of what steps were being considered.

"You do not tell your enemy what you are going to do," the Prime Minister said during a visit to Devon.

"We must never let the terrorists win," she said. "That is why we are having a thorough review of all matters."

With internment of suspects without trial apparently ruled



Mr Tom King in Ulster yesterday where he visited soldiers injured in the weekend bomb attack

out by ministers' scepticism about its effectiveness, it is thought that a strengthening of troop numbers in the province, currently standing at 10,200, is under consideration.

In a day of hectic political activity in Ulster, the Rev Ian Paisley, Democratic Unionist leader, claimed that the main Omagh to Ballygawley road, where the soldiers died, was

out of bounds for troops. The allegation was immediately rejected by the RUC.

Mr Paisley alleged that some parts of the border were "no go areas for troops" and said it was time the security forces reasserted their authority in those areas. He said he had toured the border last week and had found little evidence of a high security profile.

## ICI to raise capital spending sharply on bulk material output

By Peter Marsh

IMPERIAL Chemical Industries, Britain's biggest chemicals company, plans to spend £300m a year during the early 1990s on capital investments related to bulk materials production, a rise of 60 per cent, on present annual spending.

About half the cash will be spent at the company's overseas plants, mainly in Europe and the US. The remainder will be spent at ICI's main bulk-chemicals manufacturing sites on Teesside in north-east England and Merseyside in the north west.

The investment programme will focus largely on raising the output of existing production facilities and on cutting waste material emissions to comply with stiffer environmental laws.

Relatively little money will go towards building new plants. The investment is therefore unlikely to create many new jobs.

The ICI plans, drawn up over the past few months, reflect cautious optimism across the chemicals industry about future prospects after a difficult period since the early 1980s.

Many companies, ICI among

them, have cut capacity and employment over the past few years following the industry's steep recession at the start of the decade.

Rising demand in the past two years has led to an increased desire to sanction big investment programmes, although not on the scale of the 1970s. The sector then contributed to this decade's over-capacity by building too many plants, according to many in the industry.

ICI's programme will affect activities in its chemicals and polymers group, the company's biggest subsidiary which is responsible for two-fifths of its £1bn annual output. The group is responsible for all of ICI's production of bulk materials made from basic chemicals like ethylene and chlorine.

The chemicals and polymers group is a world leader in making commodity plastics, industrial chemicals and fibres—areas of chemicals where growth rates are lower than those in the more specialist chemicals fields such as drugs and agrochemicals, but where profitability has in the past two years returned to reasonable levels.

## N.Americans 'enjoy best spending power'

By Ralph Atkins, Economics Staff

CITIZENS in the US, Canada, Norway and Switzerland have the greatest spending power within the 20 states of the Organisation for Economic Co-operation and Development, official UK figures indicate.

Calculations by the Central Statistical Office also show that Britons have more spending power than Austrians, Belgians and Italians.

The figures indicate that the gross domestic product per capita in the UK compares more favourably with many other countries if exchange rates taking into account differences in purchasing power are used. The usual method is to use market exchange rates.

The CSO estimates use purchasing power parities—the exchange rate which would have to prevail if money, changed from one currency to

another, were to retain the same purchasing power.

Using market exchange rates, for instance, GDP per capita in 1987 in Italy was 12 per cent higher than in the UK.

But using purchasing power parities, UK citizens turn out to be slightly better off.

Market exchange rates do not allow fully for price differences between countries. The number of pounds sterling which would buy a selection of goods and services in the UK, will not necessarily buy the same selection elsewhere.

The CSO says that if GDP per head is calculated using purchasing power parities, comparisons between countries better reflect relative living standards. They are also distorted less by short-term movements in market rates.

The results generally show

Britons to be wealthier than might otherwise be thought.

GDP per capita in the UK turns out to be higher than in Italy, Austria and Belgium where market exchange rates would suggest it was lower.

Out of 20 countries in the Organisation for Economic Co-operation and Development covered by the CSO, Britain rises from fifth from the bottom to eighth from the bottom.

The CSO says there is also less variation between country when purchasing power parities are used. This means the gap between Britain and more affluent countries is lessened.

One notable difference is with Japan. Market rates would suggest that the Japanese are 66 per cent better off than UK citizens; CSO estimates show a difference of just 7 per cent.

## GDP PER CAPITA (UK=100) 1987

	At market exchange rates	At PPP exchange rates
UK	100	100
Belgium	121	96
Denmark	171	108
France	136	104
W Germany	157	109
Greece	49	52
Ireland	70	59
Italy	112	98
Luxembourg	142	116
Netherlands	128	101
Portugal	32	51
Spain	34	70
US	156	140
Canada	138	140
Japan	166	107
Austria	134	96
Finland	163	105
Norway	171	127
Sweden	165	113
Switzerland	223	130

\*Purchasing power parity

Source: Central Statistical Office

## The art of the understatement.

At Lloyds Bank we've always taken an independent stance when reporting good news. We usually err on the side of understatement.

But it's hard to understate the performance of our International Money Market Fund.

Since its launch in 1983 the Fund's value has increased to US\$93 million, with increases in assets of 237% and 58% over the last two years.

Also out of a total of 207 similar funds we have no less than three classes in the top ten.\*

There are a full nine single currency classes to choose from. Furthermore, we now offer two managed currency classes denominated in Sterling and US Dollars, which give you the benefit of our professional management of currency exposure.

In addition, there are no additions. No hidden charges,



Page Two: The Independent Press

no front-end fee, no price spread and, depending upon your country of residence, no income or capital gains tax.

It is also worth remembering the security offered by this type of investment when compared with the volatility of equity markets.

The Fund represents a highly liquid form of investment requiring a maximum of just seven days' notice prior to withdrawal.

Application procedure is simple and investments can be switched between currency classes free of charge.

A fine set of features, to say the least.

If you would like more details on how to apply and the opportunities offered by investing in this Fund, simply fill in and send off the coupon.

Lloyds Bank Fund Managers (Guernsey) Limited  
PO Box 136, Dept. FT, St. Peter Port,  
Guernsey, Channel Islands  
Telephone 0481 24983 Telex: 4191314

Please send me the latest prospectus of the Lloyds International Money Market Fund on the sole basis of which investments can be accepted.

Name \_\_\_\_\_

Address \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_



**W**hat you see below is Biometric Security in action. The operator stretches out his hand. He places it on a measureplate in front of him. A three-dimensional image of his hand is then calculated. It takes into account the distance between fingers, palm thickness, even the translucency of his skin.

If the image matches his pre-recorded one, he is granted access to the computer.

Biometric Security devices authenticate a person's identity by matching a unique physical or behavioural characteristic.

Currently there are six types available. Hand geometry, retina scans or the 'eye

**ONE SMALL GESTURE COULD HELP  
SAVE £40 MILLION A YEAR LOST THROUGH FRAUD.**



signature,' voice verification, fingerprinting, signature comparison and keystroke dynamics (typing patterns).

Together they form the most sophisticated defence against computer fraud. Indeed, they have been described as 'the Rolls Royces of the security industry.'

Installed throughout British Industry, they could go a long way to negating computer fraud altogether.

Yet regrettably they are employed in relatively few companies. That in itself gives just cause for concern.

But consider this: Computer fraud is just the tip of a £5 billion fraud iceberg.

It is a fact that the majority of frauds are committed by disgruntled employees. That 75% of all frauds are for sums no more than £25,000. And that most frauds are discovered by accident or by tip-offs.

Unfortunately it is also true that many companies seem to have adopted a 'head in the sand' attitude to the whole problem.

They believe that their security is quite sufficient already. And that it is hardly management's responsibility to act as their employees' conscience.

At Ernst & Whinney, we take a different view. We believe that responsibility for preventing, detecting and limiting the effects of fraud lies primarily with management.

But we offer you more than just informed opinion. We've set up a group within our organisation to deal specifically with fraud.

We have specialists within the group who can help you create the most effective security system.

We can even assess the impact and consequences of suspected or proven fraud.

Call us today if you think we can help. More pointedly, call us if you think you are convinced we cannot.

**E&W Ernst & Whinney**  
Accountants, Advisers, Consultants



## UK NEWS

## Credit controls urged to help close trade gap

By Richard Donkin

A SHARP FALL in British export growth revealed in a business survey could lead to a wider trade deficit unless the Government moves to curb the credit boom with measures other than higher interest rates, the Association of British Chambers of Commerce warned yesterday.

The association's national survey of 3,015 companies shows a dramatic fall in the balance of those reporting increases in export orders during the second quarter.

London manufacturing exporters reported a marked fall in export orders. While a balance of +50 per cent reported increased export orders in the previous quarterly survey, the balance had tipped to -1 per cent in the last quarter. Other strong export-

ing areas also reported falls.

The export picture, masks an otherwise optimistic report, with 57 per cent of companies confident of a growth in turnover. The association believes that the slackening in exports could reflect a lack of interest in exporting during the present domestic consumer spree.

This could be damaging if a strong pound supported by higher interest rates makes imports more competitive, said Mr Roger Burman, the association chairman.

A ½ per cent rise in interest rates does little to alter spending patterns, he said, but controls on credit, such as larger deposits for higher purchase and higher minimal payments on credit cards could restrain spending without hitting manufacturing costs.

### Rectification

With the Board of Directors' consent the Board of Managing Directors has decided to set the half-yearly dividend of the 1988 financial year at NLG 2.30 per ordinary share of NLG 20,- par value.

At the shareholders' option, this dividend will be paid either entirely in cash or NLG 0.35 in cash and 2.5% (i.e. for an amount of NLG 0.50) in new ordinary shares charged to the share premium reserve or, if desired, to general reserves; these new shares are entitled to participate in the final dividend for 1988 and dividends in subsequent years. The stock dividend will not attract income tax or withholding tax in the Netherlands. The interim dividend will be made payable as from August 22nd, 1988 at:

In the Netherlands:  
All branches of Amsterdam-Rotterdam Bank N.V.

In Belgium:  
All branches of N.V. Generale Bank.

In the UK:  
Amsterdam-Rotterdam Bank N.V., London.

In West-Germany:  
Deutsche Bank AG, Commerzbank AG, Dresdner Bank AG, Westdeutsche Landesbank Girozentrale at Frankfurt am Main, Düsseldorf and Hamburg. Insofar as said institutions have branches in these cities, and Amro Handelsbank AG, Cologne.

In France:  
Société Générale.

In Switzerland:  
Schweizerische Kreditanstalt, Schweizerischer Bankverein, Schweizerische Bankgesellschaft, Amro Bank und Finanz and MM. Pictet & Cie.

In connection herewith, upon presentation of dividend coupon no. 76 forming part of the ordinary share certificates of NLG 20,- nominal value, an amount of NLG 0.35 less the 25% withholding tax due on dividends in the Netherlands - will be paid in cash, i.e. per

certificate of 50 ordinary shares: NLG 13.125  
certificate of 10 ordinary shares: NLG 2.625  
certificate of 1 ordinary share: NLG 0.2625

Where shareholders opt for the stock dividend charged to the share premium reserve, as referred to above, then upon presentation of dividend coupons no. 77, one ordinary share with dividend coupon no. 78 et seqq. and counterfoil attached (which is entitled to participate in the final dividend for 1988 and dividends in subsequent years) will be issued for every 40 ordinary shares held.

Any unclaimed shares in respect of dividend coupons no. 77 which are still outstanding after November 14th, 1988 will be sold and the proceeds will be held at the disposal of the holders of those dividend coupons which have not been presented at that date on a pro rata basis.

In connection with the exchange of dividend coupons no. 77 for new shares, corporate members of the Amsterdam Stock Exchange Association will be paid the official rate of commission so as to enable the said exchange to be effected free of charge to the holders.

Shareholders requesting their bank to mail their securities to them or to deliver them into their hands for the purpose of this exchange will be charged the usual fee for delivery of securities.

In connection with the aforementioned stock dividend, the necessary shares will be irrevocably deposited at the company's office until November 14th, 1988 unless previously claimed by shareholders.

Where shareholders opt for payment in cash, then upon presentation of dividend coupon no. 77 forming part of the ordinary share certificates of NLG 20,- nominal value, an amount of NLG 1.95 - less the 25% withholding tax due on dividends in the Netherlands - will be paid in cash, i.e. per

certificate of 50 ordinary shares: NLG 73.125  
certificate of 10 ordinary shares: NLG 14.625  
certificate of 1 ordinary share: NLG 1.4625

Dividend coupons presented via a bank or stockbroker must be stamped on the reverse with the firm's stamp.

Holders of CF-certificates, will be entitled to their cash dividend and rights to payment in ordinary shares through the intermediary of the institution which had custody of the dividend sheets forming part of their share certificates as at the close of business on August 11th, 1988.

Amsterdam, August 11th, 1988

Amsterdam-Rotterdam Bank N.V.

Amro Bank

## Charting a rising curve with Elan

Kevin Done finds Group Lotus glowing about prospects under GM

THE DYNAMIC performance of Group Lotus's cars has not always been matched by a financial ability to stay on the road.

Little more than five years ago the British sports car and automotive engineering group was still worrying how to pay the next monthly wage bill.

But its balance-sheet worries were finally alleviated when General Motors took over the group in 1986. Now Lotus is changing gear in a bid to accelerate growth and more than triple turnover by 1992.

Far from being crushed by the size of its new owner, Lotus represented a trifling 0.77 per cent of GM's \$101.8bn (\$59.9bn) turnover last year. Mr Michael Kimberley, Group Lotus chief executive, claims the relationship with Detroit is "Utopian". Lotus has been left to operate independently but has been taken off the "cash-flow treadmill".

"To generate new cars on a non-existent budget was always a tremendous struggle," he says. "GM has not put any new equity into the company but it has given us the borrowing power to fund our aggressive five-year plan and invest the profits back into the business."

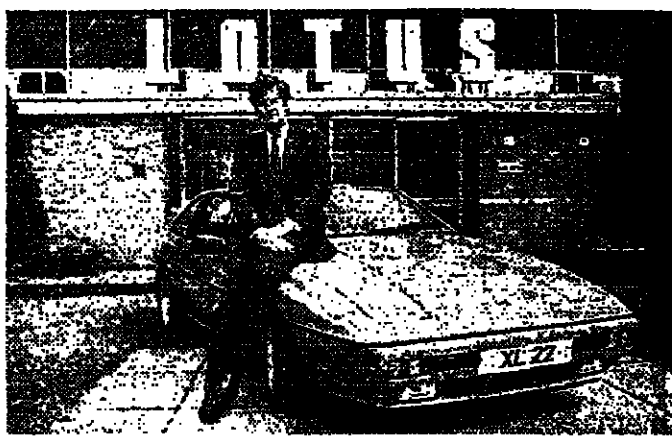
Late next year Lotus will launch a small sports car and re-enter part of the market it first tapped in the 1960s with the popular, if unreliable, Elan. The new Elan will be followed in 1990/91 by a "super-car" aimed at challenging the best Ferraris and Lamborghinis.

The sports car, code-named M100, will extend the Lotus range from its present narrow offering of mid-range high performance sports and touring cars, the 150mph Esprit Turbo and the Excel.

It is thought that the new Elan will be front-wheel drive, powered by a 1.6 litre Isuzu engine developed jointly with Lotus, and will use an Isuzu transmission.

The supercar, code-named the M300, is intended to provide a stylish platform for the latest products of Lotus engineering research and development. This is now the core of the company's operations and includes what is claimed to be its world-beating active suspension system.

Car output from the company's Norfolk manufacturing



Managing director Kimberley with the Lotus XL

plant in East Anglia, set in the green acres of a Second World War US bomber base south of Norwich, is set to expand from last year's modest 788 cars to 1,135 this year. Lotus intends output to hit 5,000 cars by 1993, with the Elan accounting for some 3,000.

Lotus hopes demand will still be at least three times maximum production, in spite of the expansion. "We are planning scarcity," says Mr Michael Kimberley, Group Lotus chief executive. "That is a key for our image in the future."

It is aiming to achieve a balance of car and engineering consultancy sales between Europe, North America and the Far East. The group is building a US headquarters in Atlanta as part of plans to raise US sales to 2,000 cars a year by 1993. In the first half of 1988 Lotus sold 172 cars to the US.

The Lotus workforce has already grown to more than 1,150 after having been pared down in 1983 to only 385 in the midst of the last major financial crisis. The new growth excludes the 220 employees added recently with the acquisition from GM of the 700-acre Millbrook proving ground near Bedford.

Mr Kimberley expects the workforce to stand at 2,300-2,400 by 1992. Turnover is planned to climb to £170m from £37.6m in 1987. Pre-tax profits fell last year to £803,000 from £1.9m in 1986, but Mr John Sandford, finance director, expects a rebound to more than £2m this year as turnover exceeds £55m - divided about equally between cars and engi-

neering consultancy - supported by a £45m engineering order book.

"This year will be the best in Lotus history by a mile and a half," he insists.

After years of losses the car operations may break even this year and Mr Kimberley insists they will be profitable next as they begin to reap the benefits of significant investment after 15 years of neglect.

Cars showed an operating loss last year of £12m on a £16.8m turnover against an operating profit of £3.5m from engineering consultancy on a £20.5m turnover.

Group Lotus is investing £32m-£34m of its £54m five-year capital spending programme up to 1992 on the car operation.

The spending is huge by Lotus standards, it chickenfied in world car industry terms. It says much, however, about Lotus' low-cost, low-volume production methods in which the group uses composite plastic rather than steel bodies.

While the cars provide the glamour for the Lotus name, it is for its engineering skills that the world automotive industry is beginning to beat a path to its door.

Lotus claims that it is working for 20 of the world's vehicle makers on 53 different engineering projects. Many of them are shrouded by client confidentiality, but in a growing number of cases customers are using the Lotus link as a marketing tool.

For Isuzu of Japan, Lotus has re-engineered the steering, brakes and suspension of its Piazza coupé - it is now labelled "handling by Lotus". For

Chrysler of the US it has re-engineered an existing engine as a high performance unit. (Most famously, or infamously, one of Lotus' earliest outside engineering projects was the design and development of the ill-fated De Lorean car.)

Lotus pins its highest hopes on development of its computer controlled active suspension, which Mr Kimberley claims will "revolutionise the transport industry". Lotus says it has a world lead in the technology, which it developed out of work with its Formula One racing team. Although it admits that Daimler-Benz of Germany is close on its tail lights.

Lotus says active suspension will dramatically improve car handling by reacting in thousandths of a second to changes in road surfaces or to the demands placed on a car by its driver. Computer-controlled hydraulic rams replace the springs and they flex to smoothe out the ride, like a downhill skier's legs.

The system even allows cars to bank into corners like a motorbike. "You get 15-20 per cent more cornering capacity," says Mr Kimberley.

It was GM's desire to protect its access to Lotus' expertise in this area that led the US group to take over the company. Lotus is now working with different manufacturers on 12 separate development projects for active suspension and Mr Kimberley claims to have "six more potential clients queuing".

The system is expected to be introduced in limited volumes on a GM car in 1990, while Lotus itself will launch active suspension on its M200 supercar. It is commercialising the system with Moog, the leading US manufacturer of servo systems, in a 40/60 joint venture Moog-Lotus Systems.

Lotus is also demonstrating systems for its anti-noise technology, whereby computer controlled soundwaves act to cancel out other intrusive noise in the car such as low frequency engine boom, the low drone often caused at high engine speeds.

"I am trying to use creativity as a profit generator in the UK," says Mr Kimberley, "we create new technology, patent it and then license it to get it through to the bottom line."

## Space agency gives UK ultimatum on science spending

By Peter Marsh

THE 13-nation European Space Agency has given Britain until the end of the year to review its decision to block a proposed 25 per cent increase in the agency's science spending by 1994.

The discussion over the agency's spending - which other member nations want to see raised from its current annual level of about £130m to £165m by the mid 1990s - continues a running argument between Britain and other European countries over space projects.

Last year the UK provoked a storm within the agency by being the only major ESA nation to stay on the sidelines of a series of industrial space projects costing £70m until the end of the century.

Mr Arthur Pryor, the director general of the British National Space Centre, said yesterday that talks over the space science issue were continuing. He could not indicate how they would be resolved.

Britain's contribution to the ESA science budget is about 15 per cent, a proportion which would, under agency rules, stay the same if the new spending plans are approved. Any rise in the ESA science budget would, therefore, conflict with Britain's aim of keeping its overall space spending under tight reins.

Mr Pryor said that despite the difference of opinion between Britain and other ESA nations such as France and West Germany which are particularly keen on expanded European space programmes, he had received a fair hearing over the past few months from the rest of ESA.

Mr Pryor, previously a civil

servant at the Trade and Industry Department, took over as head of Britain's civilian space effort in May. He took charge of a space centre set up three years ago which had been shaken by the resignation in August last year of Mr Roy Gibson, its first director general. This followed an argument with the Government over spending.

Mr Pryor said that Britain's annual civilian space budget over the next few years was likely to be about £130m. This is up from the current figure of £120m but is at least £50m short of the figure that Mr Gibson had campaigned for.

The dispute with ESA has not, however, prevented the agency from awarding UK academic groups important contracts connected with two ambitious European ventures in space science, costing a total of £350m.

The contracts, announced yesterday, involve construction of five spacecraft which will take off in 1995 to study the sun. They are part of ESA's Soho (Solar and Heliospheric Observatory) and Cluster space science programmes.

One of the five vehicles will monitor the sun and its atmosphere from a point midway between the sun and the Earth. The other four will stay in orbit around the Earth and analyse the stream of atomic particles emitted from the sun which make up the "solar wind" - a phenomenon which can have a big impact on the world's weather.

UK academic groups and companies are expected to gain work worth about £70m either building the space vehicles or providing instruments.

## Compact disc sales advance

By Hugo Dixon

SALES OF compact discs are continuing to grow fast, but the rest of the record industry is stagnating, according to the latest figures published by the British Phonographic Industry, the trade body.

During the year to the end of June, 22.3m compact discs were sold, a 74 per cent increase on the previous year.

Much of the expansion was in sales of inexpensive CDs and, as a result, the value of sales grew by only 58 per cent.

The pre-recorded cassette market grew by 20 per cent in value to £197m, but by only 3 per cent in terms of volume.

BPI says the total market is growing at 20 per cent a year.

## European business air fares 'too dear'

By Michael Donne, Aerospace Correspondent

MANY BUSINESS air travellers believe that European air fares are much too high, and that new classes of fares, especially tailored for businessmen with much greater flexibility of operation, should be introduced.

These broad conclusions emerge from a new survey of business travellers' habits and preferences, conducted among a sample of 106 business travel managers by the Civil Aviation Authority, covering some 100,000 business round-trips a year. Overall, says the CAA, UK businessmen make some 2m international round-trips every year.

The broadest conclusion emerging is that the majority of businessmen travelling by air have firm preferences for the standards of comfort and service they require, but these can vary widely depending upon whether the routes flown are long or short-duration.

On short-haul routes, most businessmen rated flexibility of services as the most important element of air travel, with pre-flight check-in and advance seat selection as the next most important features.

But for long-haul travellers, in-flight seating comfort was considered most important, with fare flexibility coming second.

Across the sample, the managers appeared broadly content with the standards of service offered in Executive/Club (business) classes by the airlines, "and indeed were generally

prepared to see some features enhanced even at greater cost."

A majority of European travellers about 70 per cent - were dissatisfied with the levels of European fares, with a strong preference emerging for greater flexibility, with the provision by the airlines of "unrestricted tourist class fares" especially mentioned.

Many business travel managers thought the airlines ought to introduce a new grade of cheaper European short-haul Advanced Purchase Executive/Club class fares, together with a more flexible range of Advanced Purchase Excursion (Apex) fares and unrestricted Tourist/Economy fares.

At the same time, many business travel managers thought the airlines ought to introduce some form of season ticket travel or bulk-discount fares for frequent travellers.

The report only examines the responses to the survey questions, and does not indicate what the CAA intends to do with the answers.

But clearly it will now have some significant new information to help it in dealing with applications from airlines for new types of business services, especially on short-haul routes. It is also likely that major airlines will study the survey, and use it to formulate new fares policies for the future.

Business Air Fares, a UK Survey: Civil Aviation Authority Paper 88015; CAA, London, £3.75.

## Property prices start to level off, survey says

By Paul Cheeseright, Property Correspondent

THE DIZZY RISE of the residential property market in Britain appears to be slowing according to the results of a survey of 185 estate agents carried out by the Royal Institution of Chartered Surveyors.

An end to the rush of buying aimed at beating the August 1 deadline for the end of double tax relief on mortgages, a system which allowed two borrowers to claim relief on one loan, is given as one reason for the slowdown.

The start of the summer holiday period has also led to a levelling off of prices in the London market and a slackening of demand in other areas.

In its quarterly survey covering the three months to the end of July, the RICS noted that in the London area nearly 30 per cent of agents reported no price changes. The remainder reported price increases of up to 5 per cent during the three months.

Outside Greater London, however, nearly a half of the agents reported price rises of 8 per cent. But the RICS thinks that any trend towards lower asking prices in London will be reflected in the provincial market over the coming months. The rise in interest rates does not appear so far to have had any significant effect.

# When is one bigger than two?

## When two big banks join forces to make one bigger bank.

In January, 1988,

Anadolu Bankası and Türkiye Emlak Kredi Bankası merged to form Türkiye Emlak Bankası.

By combining the assets of two major state banks, Türkiye Emlak Bankası has emerged stronger, more efficient and internationally competitive. With a capital base equal to \$ 225 million, it is Turkey's third largest bank on the public sector.

Dynamic, experienced management and highly-motivated staff provide a variety of local and international banking services. Particular emphasis is given to real estate, international trade and tourism finance.

Türkiye Emlak Bankası operates 438 domestic branches and 11 representative offices in West Germany, the Netherlands, France and Saudi Arabia.

Our strength is your advantage.



TÜRKİYE EMLAK BANKASI

HEAD OFFICE: Büyükdere Cad. 45 Maslak, 80670 İstanbul-Turkey Tel: (90) (1) 176 16 20 (30 Lines) Telex: 27 780 abtk tr. Fax: 176 16 59 ANKARA LIAISON OFFICE: (90) (310) 45 45 (30 Lines)

THE REPRESENTATIVE OFFICES OF TÜRKİYE EMLAK BANKASI A.Ş.

WEST GERMANY REPRESENTATIVE OFFICE H 2, 1 (Hauptstadt) 60329 Frankfurt 1 W. Germany Tel: (069) 1 1904 13004 Telex: 947900 Lufd d BREMEN LIAISON OFFICE W. Germany Tel: 0421 25551 Telex: 340044 Andor d	BRASIL REPRESENTATIVE OFFICE Avenida W 1, 11 Rua 28 W. Germany Tel: 041 244233 Telex: 944777 Told d	MURCIA REPRESENTATIVE OFFICE Calle de 5 March 1 & March 2 W. Germany Tel: 096 244233 Telex: 128777 Told d	THE NETHERLANDS REPRESENTATIVE OFFICE W. Germany Tel: 041 244233 Telex: 944777 Told d	SACRE ARABIE Social Address: Marhaba Court P.O. Box 20 Jeddah-BAHJN ARABIA Tel: 014 244233 Telex: 944777 Told d	FRANCE REPRESENTATIVE OFFICE 22 Boulevard Hautecour 75008 Paris FRANCE Tel: 1 44 44 44 Telex: 944777 Told d
--	---	---	---	---	---

Lotus



FROM SEPTEMBER 2nd

# THE FIRST LONDON-SEOUL DIRECT FLIGHT

EVERY FRIDAY  
FROM GATWICK  
EXPERIENCE  
THE TRUE SENSE  
OF KOREAN AIR'S  
DEDICATION  
TO EXCELLENCE  
FOR INFORMATION  
CALL KOREAN AIR  
(01) 930 6513

**KOREAN AIR**  
Korean Air Lines

FOR THE COMPETITION  
FOR 2 FREE PRESTIGE CLASS  
RETURN TICKETS TO KOREA,  
PLEASE COMPLETE THIS FORM:

NAME: .....  
JOB TITLE: .....  
ADDRESS: .....  
.....  
TEL N°: .....

SEND TO: KOREAN AIR  
66/68 HAYMARKET  
LONDON SW1Y 4RF





## MANAGEMENT: Small Business

## Accountancy services

## The Big Eight: on the horns of a dilemma

Richard Waters on the ambivalence of large firms towards small



rather than calling in specialists in the consultancy division.

One firm stands conspicuously outside this pattern. Peat Marwick McLintock, the country's largest firm, has concentrated on developing generalist partners (as opposed to the more narrow specialists of other firms) and has in the past resisted the fragmentation of its business into a range of isolated practice units. As a result it has less of a cultural barrier to overcome.

Its financial structure may also be an advantage. Peat has four regional partnerships in the UK, rather than the single national partnership of the other firms.

This means that regional offices outside the south-east are under less pressure to deliver the high returns demanded of other firms. It is consequently less stringent in its focus on fast-growing companies to the exclusion of all others.

Smaller accountancy firms can also afford to take a less narrow view on their potential clients. The static company, after all, still needs accountancy services, though generally in a different range.

Most of my clients now look to us for help with drawing up their management accounts and commenting on them during the year," says Clive Parritt, managing partner of B&T Tilly.

This financial director role is not one that firms were providing for small companies 15 years ago, he says. With good finance directors thin on the ground and commanding high salaries, there is a natural market for an outsider to provide these services.

The owners of static, profitable family companies also have a need for investment and other types of personal financial planning advice - all things that make them a worthwhile proposition. "There are still a lot of specialist service opportunities," says Parritt.

## Reminders or free credit?

Richard Waters on the problems of debt collection

Does your invoicing policy encourage your customers to pay their bills late?

If your practice is to send a string of reminders before taking tougher action, then the answer could be yes.

This is the message from Jo Goranson, whose company, Justitia International, claims to be the biggest debt collection operation in Europe. He estimates that the average debt in the UK is at least 25 days overdue, and that companies should bear much of the blame for this.

A survey carried out last month by Justitia among UK companies with between 11 and 200 employees showed that almost all contract to be paid within 30 days, but only a

quarter actually receive their money within this period.

Tardy customers should be sent no more than one reminder, says Goranson. Otherwise they come to see the period before the last in a series of reminders as an invitation to an interest-free loan.

The experience of companies which have tried this is mixed. British Telecom no longer sends two reminders to its 23m customers, but follows up its bills in most cases with a final notice 21 days later. This has had "no significant impact" on overdue payments, though, a spokeswoman says.

So what do you do when customers don't respond to the tougher approach? Justitia's answer, naturally enough, is call in the debt collectors. Not

many companies do, largely because of the adverse image under which debt collectors have been labouring for generations.

Only 12 per cent of companies in the survey use a debt collector, compared with 26 per cent which take legal action of one kind or another. Debt collectors claim they are cheaper and more efficient than lawyers (the cost is about 5 per cent of the amount collected).

The debt collecting business is small and fragmented in the UK. It is ripe for development, claims Justitia, which plans to bring its big-business approach to debt collecting, already a success in a number of European countries, to the UK by 1990.

## In brief...

**The London Enterprise Agency** is starting its seventh Design Enterprise Programme in October '88. Aimed at teaching design graduates how to run a business, the course, which is free, has been running for 2½ years and more than 80 per cent of participants to date are still in business.

The course is designed for those graduates aiming to become self-employed. It provides a four-week training period and a further six weeks for market research. Each student receives up to £500 travelling expenses from the Training Commission and is assigned a personal tutor to help get the business off the ground and find premises and finance.

Details from LENTA, 4 Snow Hill, London, EC1A 2BS, or phone Trudy Upton on 01-236 3000.

**Cambridge Venture Shepherd & Jones**, recruitment and personnel consultants of Bury St Edmunds in a move aimed at strengthening the science park company's management development resources.

CVM, which takes equity stakes in its clients' businesses, sees the deal as a way of merging its experience of the problems of fast-growing ventures with Shepherd & Jones' record in industrial psychology and executive search.

**The Cranfield School of Management** has devised a "payment by results" programme designed to help entrepreneurs achieve substantial growth. Called the Business Growth Programme, it is run on a part-time basis over three months. During this time participants will be helped in devising a strategy and three-year plan.

The course embraces such subjects as raising both loan and equity capital, managing change, team building, leadership and financial control. Anyone having had full executive control over a business which has been in operation for at least three years - and with an annual turnover of less than £10m - is eligible for the programme.

Cost of the course is £3,000, with an option of paying the fees up front or by mandating up to 0.5 per cent of the value of their company's sales growth over the three years following completion of the programme. Cranfield expects to break even at about 25 per cent compound annual growth, so participants can expect to double the size of their business in little over the three years, according to Cranfield. Sponsors of the programme include British Technology Group, ECI Ventures, Ernst & Whinney, Lloyd's Bank and the Training Commission.

Further details from Colin Barrow, the Course Tutor, or Gill Marshall, at Cranfield School of Management, tel: 0234 751122.

**A second edition of the Conqueror Small Business Handbook**, updated in response to a questionnaire carried out among 1,000 small firms, has just been published by the Wiggins Teape Fine Papers, part of the Wiggins Teape group.

The publishers say that the survey showed businesses with a turnover of up to £1m a year had frequently referred to the first handbook, but had also wanted information on VAT and the more legal aspects of setting up a business.

The handbook contains nine chapters covering subjects from starting up a business to marketing and employee law. The appendix contains addresses of some 100 existing initiatives and advice centres for small companies.

Copies of the handbook, which is free, are available from Helen Baker or Cara Gibson at Green Moon, 2 Kendal Place, London W1H 3AH. Telephone 01-635 0953.

**From next month**, young people in Derbyshire with a viable business proposition will have access to grants and low interest loans. As well as offering free advice and practical help the Derbyshire Enterprise Board is making £700,000 available, the money having been provided through the Prince's Trust and the Atwell Trust.

Details from Liam Scollan, Derby Small Business Centre, Canal Street, Derby. Tel: Derby 384404.

## Business Opportunities

READERS ARE RECOMMENDED TO SEEK APPROPRIATE PROFESSIONAL ADVICE BEFORE ENTERING INTO COMMITMENTS

**100% PROPERTY FINANCE AVAILABLE**

We have completed arrangements with a major Merchant Bank to provide 100% Financing for quality Property proposals

Corporate Finance Facilities are also available for: Flotation, Acquisition or Capitalisation purposes

**MINIMUM: £1,000,000**

Principals only should write to:  
**CORPORATE FINANCE CONSULTANTS LTD**  
77 Moscow Road, London W2 7EL, or  
Telephone: 01-727 6474 Telex: 8953620 Fax: 01-221 1196

**FINANCE FOR EXPORTS IMPORTS & UK TRADE**

**BACK TO BACK LETTERS OF CREDIT**  
Finance suited to your requirements

**ELKA FINANCE LTD.**  
8/14 Orsman Road, London, N1 5QJ  
Tel: 01-729 0405 Telex: 266900

**HIGH YIELD INVESTMENT POTENTIAL**

Building group offers attractive investment for the development of selected prime properties with potential capital appreciation of 20% plus. The investor has the choice of purchasing preference equity or debentures each being backed by assets of comparable value. Active participation or directorship would also be considered.

For further details please phone C. Melrose on  
(01) 785 2229 or (01) 460 7265 or write to  
G.A. Associates Holdings Ltd, 99-101 Putney High Street, London SW15 1SS

**USM Opportunity**

USM quoted, unquoted company with positive cash flow and £10 - £12 million net assets, wants to broaden its investment base. Needs new ideas, would consider merger, acquisition for further development.

Write Box F8422, Financial Times, 10 Cannon Street, London EC4A 4BY

**AN INDIAN COMPANY WITH WELL ESTABLISHED FACILITIES**

plans procuring plant and technical know-how for manufacture possibly in India. Proposals with arrangements for percentage of buy back Indian products will be preferred. Apply: Adviser, Robbins Olive, Fides House, 10 Chertsey Road, Woking, Surrey GU21 5AQ

**INTERNATIONAL COMPANY SERVICES LTD**

Incorporate and manage companies in: UK, Ireland, Channel Islands, Panama, Anguilla, Hong Kong etc., and provide full domiciliary and nominee services. Brothers and details of fees from: Springfield Court, New Castle Road, Douglas, Isle of Man. Tel: (0624) 26500 Fax: 0624 20986 Telex: 626554 ICSLON G

London representative: International Company Services (UK) Ltd, Standbrook House, 2-5 Old Bond Street, London W1, Tel: 01-433 4244 Fax: 01-491 0805 Telex: 28247 ICSLON G

**DREAMS IN AN EMPTY CITY**

Stunning epic play by award winning Australian playwright. International cast, season at Lyric Hammersmith, West End, London. Britain-Australia Bicentennial event. Royal Gala Charity Performance 14th September 1988.

Investors wishing to participate ring 01-373 7914 or write W.A., 21 Earl Court Square, London SW5 9DE

Film and video productions for marketing, training, company profiles and broadcast advertising. Harlequin 01 783 1182

VAT-related in Germany for exhibition-contractors, display companies etc. 10% handling charge. Write Box F8423, Financial Times, 10 Cannon Street, London EC4A 4BY

**GULF BUSINESS OPPORTUNITIES**

Leading industrial & trading group of Middle East engaged in manufacturing & trading of consumer products under reputed brands, foodstuffs & allied items, having wide distribution network in Saudi Arabia, UAE and associates in other GCC countries, interested in expanding present activities with products' range.

Approaches invited for:

1. Marketing consumer products under reputed brands on exclusive agency basis.
2. Re-distributing and bulk handling of commodities or versatile products from free trade zone of Dubai to near by countries.
3. Manufacturing of established products in Dubai or Saudi Arabia.
4. Manufacturing know-how with proposal of buy back

Joint venture in any of above will be appreciated but not essential. Interested parties, agents and/or consultants please contact with introduction and full details to:

Business Development Desk, P.O. Box 4397, DUBAI (U.A.E.) Fax 00971 (4) 882714

**INVESTMENT OPPORTUNITY IN THE MUSIC INDUSTRY**

Investors are required for new record company aiming to licence completed albums overseas. High potential rewards but it should be emphasised that this is not for the faint hearted. This is a high risk area and no guarantees can be given as to returns. Potential investors' income may fluctuate. You will be investing in a private company. The investment will not therefore be easily realisable as there is no recognised market for the shares.

Serious investors only please apply to:

Box F8418, Financial Times,  
10 Cannon Street, London EC4A 4BY.

This advertisement has been approved by a firm of solicitors regulated by the Securities and Investment Board.

**TYRES TYRES TYRES**

One of Europe's largest stockholders of tyres and tubes for the African markets

Stocks in excess of £1½ Million.

We also buy excess stocks of tyres.

United Tyre Co. Ltd.  
75 Queens Road, Clifton Bristol BS8 1QP UK  
Telephone 0272-299291 Telex 446007 UNITAR G

**FINANCE YOUR STOCK**

We offer a unique stock finance facility to manufacturers and merchants and are seeking to expand our client base. If you require stock finance please apply in writing to:

Churchill Merchandising Limited,  
195 Buckingham Palace Road,  
LONDON SW1W 9SA  
Telephone: 01-730 8428

**NOVEL PROPELLERS**

considerable potential in marine, aeronautics, pumps, fans, windmills, waterwheels etc.

Inventor seeks developers/financiers for mutual benefit. Patent applications made.

Write Box H3761, Financial Times,  
10 Cannon Street, London EC4A 4BY

**CAPITAL AVAILABLE**

For investment in business seeking to expand or start-up. Funds available for many propositions.

VCA, 2 Boston Road,  
Hedley on Thames, RG9 1DY  
Tel: 0491 57999

A member of FIMBRA

**SELLING YOUR BUSINESS** Or in search of acquisition? Require Development Capital? Getworth Development Dept. 01-748 9020.

## Businesses Wanted

**HOME IMPROVEMENTS AND DOMESTIC FURNITURE MANUFACTURING COMPANIES WANTED**

We are a fully listed medium sized public company which has diversified into the above areas in recent years. We are now looking to expand those activities by the acquisition of private, well managed companies with a good profit record which is currently between £150k and £750k. If this profile fits your company and you want to continue managing it and share in its continued expansion, then contact us in confidence through:

Box No. 408, Streets Communications Limited,  
Bennetts Court, 6 Bennetts Hill, Birmingham B2 5ST.

**Plc Engineering Seeks Acquisitions**

A progressive plc is seeking to expand its business base through acquisition in the manufacturing sector

We are looking for companies in the small to medium size range with pre-tax profits of between £4m and £3m.

Consideration for the purchase of any acquisition can be based on cash or equity or a suitable mix

Write Box H3367, Financial Times, 10 Cannon Street, London EC4A 4BY

**Require Zimbabwe operating companies or companies with substantial cash assets.**

Write Box H3783, Financial Times, 10 Cannon Street, London EC4A 4BY

**ELECTRONICS SECTOR**

We are a private company wanting to form a relationship with other companies in the electronics/computer sector with a view to mutual growth. We will consider acquisition, merger or other arrangement.

Strict confidentiality accepted

Write Box H3766, Financial Times, 10 Cannon Street, London EC4A 4BY

**FURNITURE STORES**

Existing businesses or suitable vacant shops wanted urgently in London and south-east by expanding retail company.

Write Box H3761, Financial Times, 10 Cannon Street, London EC4A 4BY

**Plant & Machinery**

**TUBE MILL FOR SALE**

½" to 2¼" O/D electric Welded Steel Tube Mill, complete with tooling

Year of manufacture 1975. Excellent condition. Can be seen in situ.

Contact: Mr. Graham Knowles, Trans-Am Machinery Export Limited  
Telephone: Dudley (0384) 435411 Fax: (0384) 435911

## Business Services

**MANAGEMENT, ADVICE AND ADVERTISING AGENCY ALKMAAR**

is ready to help you with just about any requirement.

Call us for our information pack and you will see that only the truly impossible is outside our capabilities.

We offer clear, practical advice for such matters as personnel recruitment, searching for the right supplier, interior design, work clothing and music systems.

Other services on request.

For further information:  
Tel: (31) 072-12 30 59  
Fax: (31) 072-12 30 59 ext. 8  
Telex 57768 telar nl

**WE CANNOT GUARANTEE SUCCESS, BUT WE CAN DIRECT YOU TOWARDS THE RIGHT RESULT**

**BUSINESS FINANCE**

Property or Business Purchase  
Commercial Mortgages  
Business Expansion  
Management Buy-Outs  
Balance Sheet Lending

For Financial Advice or Consultancy, telephone or write to:  
David Whitaker,  
Barwick Financial Services Plc,  
43 Pall Mall, London SW1Y 5JG.

**01-930 9631**

**HOW CAN I SELL IN NORWAY**

Get the answers from Nor-Ang the Norwegian specialists. Identify your market and evaluate your product. Find out exactly what Nor-Ang can do for you.

Ring John Moore on 0533 696711 or write to: Nor-Ang (UK), Flatford Road, Thurmaston, Leicester LE4 8AS

**CORPORATE COMMUNICATIONS**

Journals, reports and newsletters. Designed, written, edited and printed. International Client list.

**MULTIMEDIA**

FREEPOST ROYSTON HUNTS SG8 7ER  
Telephone (0763) 47474 Fax: (0763) 47476

**T.C. CONTRACT PROMOTIONS LTD**

**SOMETHING COMPLETELY NEW IN THE CONTRACTING WORLD**

T.C. Market your company and make sure you receive regular TENDERS FOR MAJOR WORKS. Acquiring new business is time consuming, but you can't grow without it.

Please contact us on 01-518-2200

**BUSINESS CENTRE**

London N1 (close to city): Conference room, office suites, secretarial services, facsimile, photocopying, accommodation/business address.

TEL: 226 4611 or FAX 226 7630

**BUSINESS AND ASSETS OF solvent and insolvent companies for sale. Business and Assets.** Tel: 01-285 1184.

**Aircraft for sale**

**DUNCAN AVIATION**

32 Challenger 600-1070  
32 Jetstream 4100-1055  
32 Citation II - 0356  
32 Learjet 35A - 456  
33 King Air F-90-1 JLA-205  
31 Learjet 36A-378

(402) 475-2611



## Businesses For Sale

## For Sale

### The Business and Assets of Applesons of England Limited

(In Administrative Receivership)

The principal activities of the company are:-

- 1 The manufacture of ladies' shoes for many of the major British shoe retailers.
- 2 The provision of a quality contract stitching service for shoe manufacturers and other industries.

The two activities are separately located at Leeds and Rotherham respectively. The Joint Administrative Receivers will consider offers for each individual or both parts of the business.

- Annual turnover approximately \$4 million to 31 July 1988
- 202 employees
- Fully equipped factories
- Freehold properties of approximately 42,700 and 7,700 square feet, situated at Leeds and Rotherham respectively.

For further details contact the Joint Administrative Receiver, Ralph S Proctor on (0532) 444741 or Angus Martin on (0532) 452922.

**Touche Ross**

Eleven Albion Street, Leeds LS1 5PJ, Telephone (0532) 444741.

Authorised to carry on Investment Business by the Institute of Chartered Accountants in England and Wales.

## For Sale

### by the Joint Administrative Receivers

### The Business and Assets of Baglan Castings Limited and Hi-Tech Castings (Baglan) Limited

The Companies manufacture counterweights for the mechanical handling manufacturing industry from a freehold property at Neath, West Glamorgan which comprises a foundry of approx 35,000 sq ft on a 2 1/4 acre site. Output totals approx 6,000 tonnes of castings per annum. Plant includes V process moulding plant, induction furnace, moulding and reclamation equipment.

For further details please contact the Joint Administrative Receivers, R.G. Ellis or A.M.D. Bird.

**Touche Ross**

Blenheim House, Fitzalan Court, Newport Road, Cardiff CF2 1TS. Telephone: (0222) 481111, Fax: (0222) 482615

Authorised to carry on Investment Business by the Institute of Chartered Accountants in England and Wales.

## THOMAS BISHTON LIMITED

The Joint Administrative Receivers offer the above Business for sale:-

- Old established manufacturer offering extensive range of sterling silver and silver plated tableware.
- Connections with county jewellers, well known departmental stores and export business.
- Annual turnover approximately £500,000.
- Leasehold premises Jewellery Quarter, Birmingham.

Further information may be obtained from the Joint Administrative Receiver, A.P. Supperstone.



Stoy Hayward

A Member of Harcourt & Harcourt International  
ACCOUNTANTS BUSINESS ADVISERS MANAGEMENT CONSULTANTS  
WATERLOO HOUSE, 20 WATERLOO STREET,  
BIRMINGHAM, B2 5TE. TELEPHONE: 021 625 4240.

### TAX HAVEN

Info of Man Co. Administration  
Business  
**FOR SALE**  
Massive client base with potential for expansion.  
Genuine reason for sale.  
Principal only please apply with Box  
H3774, Financial Times, 10 Cannon Street, London EC4P 4BY.

### LIFE AND PENSIONS BROKERAGE

- Scottish based  
- Comm. and fees c. £200k  
Write Box H3765, Financial Times, 10 Cannon Street, London EC4P 4BY

### FOR SALE

Heavy Fabrication Company  
Sales over £2 million.  
Extremely modern plant.  
Eng products. Ongoing skilled workforce. Modern 24,000 sq. ft. factory offices.  
Write Box H3766, Financial Times, 10 Cannon Street, London EC4P 4BY

### SERVICE INDUSTRY BUSINESS FOR SALE

High profits from audited accounts. Would suit companies seeking diversification or individuals looking for independence.  
Write Box H3767, Financial Times, 10 Cannon Street, London EC4P 4BY

### SCOTTISH HIGHLANDS

- Caravan park - 55 acres.  
T/O in excess of £380,000.  
Full details from Financial Times  
45 Church Street, Liverpool, L7 1DR.  
Tel. (0443) 224343

### FOR SALE

Wholesaler/distribution Company - fresh and frozen foods into Northern England/Southern Scotland. Established customer base in Retail Sector. Turnover approx £1m with diverse potential for expansion. Location - North East.  
Write Box H3770, Financial Times, 10 Cannon Street, London EC4P 4BY

### Profitable Manufacturing Company

of C.N.C. Machine tools in the South has insufficient funds to relocate due to expiry of lease hence sale.  
T/O around £500,000.  
Write Box H3771, Financial Times, 10 Cannon Street, London EC4P 4BY

### Health/Smoker Club

Licensed and superbly appointed with restaurant facilities. Town centre site. Current membership 750. No longer fits the Holding Company's core business.  
Write to Box H3772, Financial Times, 10 Cannon Street, London EC4P 4BY

### FOR SALE COMPANY MANUFACTURING SECTIONAL BUILDINGS

Audited information available in STRICT CONFIDENCE to interested parties.  
Write Box H3773, Financial Times, 10 Cannon Street, London EC4P 4BY

### FOR SALE

Toolmaking Co. located East Herts. Est 1960. Good quality long standing accounts. Owners retiring but willing to remain for short period if required. T/O 160,000-200,000. Offers around £75,000.  
Write Box H3774, Financial Times, 10 Cannon Street, London EC4P 4BY

## Jewellery Retailers

The Administrators are inviting offers for the business and assets of a jewellery retailer operating concession outlets:

- Retailers of brand name jewellery.
- Turnover in excess of £500,000 per annum.
- Nine concessions in two major superstore groups.
- One High Street shop (rented).

For further details please contact R.C. Turton, J. Wilson or P.A. Revell at Spicer &amp; Oppenheim &amp; Partners, Clumber Avenue, Sherwood Rise, Nottingham NG5 6GT. Telephone: 0602 607131.

**SPICER & OPPENHEIM & PARTNERS**  
A MEMBER OF SPICER & OPPENHEIM INTERNATIONAL

## Subjective Audio Limited

The Joint Receivers and Managers of Subjective Audio Limited, a leading consultancy firm in the supply and installation of specialist audio and audio/visual equipment, offer for sale the business and goodwill (including name) of the company.

All queries to the Joint Receivers and Managers  
DM Ghosh FCA and MD Gerske FCA, Price Waterhouse,  
No 1 London Bridge, London SE1 9QL  
Telephone: 01-378 7200 Telex: 931709  
Telecopier: 01-334 5566

**Price Waterhouse**

### PROFITABLE, WELL KNOWN and DISTINCTIVE

### WEST END RESTAURANT FOR SALE

Principals only please.

Write Box H3771, Financial Times, 10 Cannon Street, London EC4P 4BY

### ESTABLISHED PUBLISHING COMPANY FOR SALE - LONDON

Two monthly trade magazine titles positioned within established markets sectors with record of recent growth in revenue and market share. Excellent potential for further development. Combined annual t/o in excess of £500,000 - gross margin c.250,000. Company for sale with net assets of c.£50,000 or magazine titles for sale together or separately.  
Write Box H3775, Financial Times, 10 Cannon Street, London EC4P 4BY

**FOR SALE**  
TEXTILE MACHINERY  
MANUFACTURING CO.  
Medium sized textile manufacturing company in Central Lancashire. For sale due to reorganisation of the engineering group. Principals only apply in writing for further particulars to:  
Edwards Venn, Chartered Accountants,  
Barnesley Street,  
Ulverston, Cumbria LA1 1DE.

Company on the Shelf  
Name of  
**BUZZBY LTD**  
For sale. Offers to...  
Browns Butler & Co Ref TRG  
Yorkshire Bank Chambers  
Infirmary Street, LEEDS 1

## MANAGEMENT CONSULTANCY

The Financial Times proposes to publish this survey on:

Wednesday 5th October

For a full editorial synopsis and advertisement details, please contact:

Claire Broughton  
on 01-248 8000 ext 3234

or write to her at:

Bracken House, 10 Cannon Street  
London EC4P 4BY

**FINANCIAL TIMES**  
EUROPE'S BUSINESS NEWSPAPER

## DELLFIELD DIGITAL LIMITED In Receivership

The business and assets of the company are available for sale as a going concern. The company designs, manufactures, sells and services computer controlled telephone systems. It operates at leasehold factory premises in Stroud, Gloucestershire

- annual turnover \$4 million
- subsidiary manufacturing supplier in Singapore
- leasehold factory of 28,000 sq ft in Stroud
- 68 employees
- blue-chip customers

All enquiries should be addressed to:-  
R. W. Birchall, FCA and  
C. J. Barlow, FCA,  
Joint Administrative Receivers,  
Cork Gully,  
66 Queen Square,  
Bristol BS1 4JP.  
Telephone: (0272) 277165  
Telex: 449852  
Fax: (0272) 307008

Cork Gully

Cork Gully is authorised by the Institute of Chartered Accountants in England and Wales to carry on investment business.

### Scotland

## LETHAM GRANGE Hotel, Golf Course, Curling Rink & Leisure Complex.

Within 1 1/2 hours of 75% of the Scottish population.  
► 20 Bedroom Hotel with p.p. for extra 35 beds.  
► Championship standard 18 hole Golf Course: "The Augusta of Scotland".  
► 75 Residential village plots.  
► 2nd Golf Course under construction.  
► P.p. for Country Club and 80-100 timeshare apartments.  
► Ideally located close to Carnoustie, St. Andrews and other historic golf courses.  
► About 350 acres in beautiful Angus countryside.  
For sale privately. Please contact:  
17 Abercromby Place, Edinburgh EH3 6LT.  
Tel: (44) 031-556 8841 Fax: (44) 031-556 5158.

**Arthur Young Chartered Surveyors**  
A MEMBER OF ARTHURYOUNG INTERNATIONAL

## Gang-Nail Systems Limited

The company is a profitable and respected supplier to the building and construction industries. It provides a complete system to fabricators of trussed rafters including structural engineering design, CAD software, metal fasteners relating to the proprietary software, and fabrication machinery.

- current annual turnover in excess of £4.5m
- last reported profit before tax £0.8m
- large share of niche market
- modern leasehold property in the South of England

For further details contact:  
R.D. Rison FCA, Price Waterhouse, Livery House,  
169 Edmund Street, Birmingham B3 2JB.  
Telephone: 021-200 3000. Fax: 021-200 2902.  
Telex: 338689.

Price Waterhouse is authorised by the ICAEW to carry on investment business. Responses are required by 2 September 1988.

**Price Waterhouse**

### Diverse Textiles Group

Privately owned group in the North West will consider disposal in whole or in part, trading profitably with an anticipated group turnover in the current financial year of £9 million.

Write Box H3772, Financial Times, 10 Cannon Street, London EC4P 4BY.

### US COMPANIES FOR SALE

Speciality brass products mfg. T.O. \$5m; Pizza Pie mfg. T.O. \$9m; Stamping tool and die co. T.O. \$10m; Aerospace/defense comm component T.O. \$4m; Speciality Bldg material co. T.O. \$200m; Finance Co. T.O. \$2m; Light mfg (wooden products) T.O. \$2m.  
Contact Colchester (UK) Ltd, 58 Baker St, London W1M 1LA. Tel 486-0081

### EDUCATIONAL/TRAINING SCHOOL

SUPERB EDUCATIONAL ENTERPRISE LARGE URBAN FREEHOLD SITE  
North England. £1 million T/O. 500 full-time day pupils: massive untapped adult market in 5 million conurbation. Magnificently equipped - catering for all school examinations - Language/computer/secretarial/office training.  
Freehold site valued in excess of £2.5 million.

Europe 1992 old First time on open market in 100 years. PLC/Principals only. For sale as a going concern, but may consider alternative. Strictly no postal details, site visits only on receipt of company/personal details. Retirement sale.  
Box No H3748, Financial Times, 10 Cannon Street, London, EC4P 4BY.

### WELL ESTABLISHED LITHO/ GRAPHICS COMPANY FOR SALE

Annual profits in excess of £200,000.  
Price required £1m. Principals only.

Write Box H3775, Financial Times, 10 Cannon Street, London EC4P 4BY

### FOR SALE SUBSCRIPTION-BASED MAGAZINE

An established magazine with a paid-for subscription of £250,000 per annum is available for purchase. The magazine has a proven and continuing growth record of 25% minimum per annum. 75% of the subscription income is derived from Standing Orders, and annual renewal rates from all subscribers is 85%. This is an exceptional publishing opportunity.

Please write to:  
Mr. John Nicholas, Shorles & Co. Chartered Accountants  
No. 100 Wignans Street, London W1H 0AE

### FOR SALE REPLACEMENT WINDOW AND PATIO DOOR BUSINESS

Well established business with good profit margins and substantial turnover operating from leasehold premises in Leicester and Nottingham. Sale to include Leases, Equipment, Stock and Work in Progress, Goodwill, Motor Cars (2) etc.

Applications to:  
F.A. Simms (Administrator)  
Insol House,  
39 Station Road,  
Lutterworth,  
Leicestershire LE17 4AP

### OFFERS ARE INVITED FOR

A well established and profitable company engaged in the hire, sale and maintenance of forklifts.  
The company has many longstanding blue chip customers and is currently expanding its rental fleet rapidly. Principals only.

Write Box H3767, Financial Times, 10 Cannon Street, London EC4P 4BY

### TAXIS/PRIVATE HIRE BUSINESS

For sale due to retirement. Established 1972. Mid-Surrey based. Net profit before depreciation on last audited accounts at 31.8.87 was £42,101. Valuable lease and cars and goodwill. Price £200,000. High potential for increased profits.

Write Box H3769, Financial Times, 10 Cannon Street, London EC4P 4BY

### FOR SALE GRAIN, RAPE & ALTERNATIVE FEEDS DRYING CLEANING & STORAGE BUSINESS

CONTACT: N.P. DADD, FCA,  
GILES DOWN ASSOCIATES  
15 SOUTHGATE STREET  
WINCHESTER  
HAMPSHIRE SO2 5DZ  
0982 - 840765

### TRAVEL BUSINESS

Business House turnover £1.5m. Central London. Fully computerised. IATA. Price indicator £250,000. Further details from: Max S M Wells, FCA, Morton Thomson, Torrington House, 47 Holwell Hill, St Albans, Herts AL1 1UD. Tel: 0772 38225

### FOR SALE

Small joinery manufacturing business engaged in Shop, Bank and office. Based N.W. Surrey. Established 25 years with first class name and client list.

Contact: David Turnbull, D.A. Turnbull &amp; Co. Chartered Accountants, Victoria House, Victoria Road, Almsbury, Hants Tel: 0252 27666 Fax: 0252 310890

### FOR SALE

Established financial recruitment agency operating in profitable niche. Small but excellent client base. Principals only.

Write Box H3777, Financial Times, 10 Cannon Street, London EC4P 4BY

## FRANCHISING

The Financial Times proposes to publish this survey on:

Saturday 24th September

For a full editorial synopsis and advertisement details, please contact:

Jacqueline Keegan  
on 01-248 8000 ext 3740

or write to her at:

Bracken House, 10 Cannon Street  
London EC4P 4BY

**FINANCIAL TIMES**  
EUROPE'S BUSINESS NEWSPAPER

## FINANCIAL TIMES INTERNATIONAL CONFERENCES

1988

The following conferences are among those being arranged by the Financial Times this Autumn.

### Commercial Aviation to the End of the Century

- Expansion in an Era of Accelerating Change  
30, 31 August & 1 September - London

### Capital Markets Workshops

12-14 September, 17-19 October,  
7-9 November, 7-9 December - London

### The FT City Seminar

19, 20 & 21 September - London  
FT-City Course

### Electronic Financial Services into the 90s

20 & 21 October - London  
The Sixth Professional

### Personal Computer Conference

31 October & 1 November - London  
World Electricity

14 & 15 November - London  
Europe 1992 and Beyond:

Strategies for European Business  
21 & 22 November - London

European Business Forum  
5 & 6 December - Rome

For further details please tick box.

- ☐ Commercial Aviation to the End of the Century
- ☐ Capital Markets Workshops
- ☐ The FT City Seminar
- ☐ FT-City Course
- ☐ Electronic Financial Services into the 90s
- ☐ The Sixth Professional Personal Computer Conference
- ☐ World Electricity
- ☐ Europe 1992 and Beyond
- ☐ European Business Forum



For information please return this advertisement, together with your business card, to:  
Financial Times Conference Organisation  
128 Jernyn Street  
London SW1Y 4UJ  
Telephone: 01-925 2323  
Telex: 27347 FTCONF G  
Fax: 01-925 2125

## TECHNOLOGY

# First revs for the volume plastic car

John Griffiths reports on breakthroughs in the use of plastics to make vehicles

The first small family cars with thermoplastic bodies could be in showrooms in six years' time if vehicle makers finally grasp the opportunities presented by new composites, according to General Electric's plastics subsidiary in Europe. The company asserts that one of the biggest obstacles to the adoption of plastics for car bodies in high volumes - how to dispose of millions of non-biodegradable panels annually - has been overcome. Meanwhile, overall production costs and practicality, even at volumes of 250,000 units a year, can already be competitive with pressed sheet steel, says Richard McKechnie, design and engineering manager at GE Plastics' European automotive centre in Bergen op Zoom, the Netherlands. McKechnie leads the GE team which recently unveiled the Vector, a four-seater car incorporating thermoplastics - mostly a material called Noryl Q172. It is used for Vector's front and rear wings and tailgate outer skin.

Development work on the car is continuing under a three-stage programme which will eventually see even extensively stress-bearing body components replaced by plastics. GE Plastics executives stress that they regard the Vector, a relatively innocuous-looking small hatchback, as important not for its design but for the fact that it was built with production and semi-production tools in order to demonstrate manufacturing viability.

The advantage of using plastic composites is that tooling costs are claimed to be only a fifth of those for metal-working equivalents. This opens the way for vehicle makers to

bring out a greater variety of models more frequently, says Paul van Hove, GE Plastics' manager of automotive operations in Europe. However, the most important difference between the thermoplastics used for the Vector's body panels and the more conventional thermoset materials, including the SMC compound to be used in General Motors' GM-300 "people carrier", comes in the recycling arena. Whereas the thermoset can only be chopped up or burnt after its life in a car, thermoplastics will melt down into a liquid again. The result, says McKechnie, is that "they are almost fully recyclable."

"Body panels, having done a good job of shaping and protecting the car in their first

life, can then be melted down, but with the material still retaining a large percentage of its original properties. So in its second life it could become, for example, a part of the car's interior trim. "And when that life is finished, the material could still be used for things like coffee-makers."

McKechnie suggests that there are so many uses for the by then low-grade plastics - for example pipelines - that it would be many years before a problem of disposing of surplus material began to appear. And, pointing to a clear plastic bag containing small, hard grey granules which were once a body panel, he says it is so inert "you could even fill holes in the ground with it."

With the Vector demonstrating the use of thermoplastics for some body parts, the onus now passes to the manufacturers to incorporate the material in production models. The old problem of the length of time taken to lay up a plastic panel has now disappeared, says McKechnie, because the Vector's panels are simply stamped from Noryl sheet. The panels are not self-coloured, but can withstand the baking ovens of a conventional car paint plant without distortion or surface deterioration.

The inner tailgate skin, engine sump and rocker cover are injection moulded from composites produced through a joint venture between GE Plastics and the Pittsburgh-based

PPG group. The tailgate is moulded from Azloy, a stiff material which is claimed to have saved 5% kg in weight compared with a conventional pressed steel tailgate. Cycle time, even for the tailgate, is less than 60 seconds. Engine parts are moulded from another composite, Azmet. In the second phase of the Vector's development, the plastic parts will include the bonnet, inner and outer door skins, the complex bulkhead between driving and engine compartments and the roof. Stage three will introduce more structural parts. The manufacturing flexibility which comes with the use of plastics and the low tooling costs are other important factors in favour of the technol-

gies being adopted for the cars of the 1990s, according to McKechnie. However, like the US car makers now seeking government approval for joint research, McKechnie says there is still much work to be done on such questions as how composites behave in crashes, their long-term resistance to vibration and other engineering unknowns or half-knowns. "We know that if the industry carries on making cars in the current way, tooling and other costs will become so high that we see some car makers going out of business. "Equally, no manufacturer can afford to put an unsafe car on the road. So much does still need to be done - we need to establish what the limits are."



The Vector: demonstrating the use of thermoplastics for some car body parts

## Diagrams of unseen circuits

PEOPLE who have to test, repair or assess electronic systems with which they are unfamiliar can obtain diagrams of circuit boards using the 1990 system from DCA Technology of the UK.

The 1990 is an automatic tester aimed at the repair and maintenance market where the original diagrams are not always available.

Device interconnections on the board are learnt by the 1990 using a new software package. By examining the interconnections and referring to a library of electronic components, the test system tells the user where to connect probes. It then draws a schematic diagram of what is on the board, indicating the logical function of each device.

## WORTH WATCHING

Edited by Geoffrey Charlish

emerging from an oven could be checked for size and shape at two per second, with automatic rejection of the substandard ones. More complex visual decisions take longer. Powerful software development facilities are built in for designing and testing new inspection routines.

Q-Vision includes a camera, an image processing computer, a supervisory microcomputer, a keypad for production operators and two displays, one for the image and another for programming/operating text. All except the camera is contained in a single rugged cabinet suitable for factory environments. The system is completely automatic and statistical information is continuously displayed.

## Pillows filled with wool

SIMPSON'S Wool, a New Zealand company, is making duvets and pillows out of wool, a material which would normally be regarded as too heavy for filling.

The company has developed a way of spinning the fibres into small hollow spheres. These are used in pillows to keep the filling soft and uncompressed by entrapping air and preventing the fibres from clumping together with use.

A similar method, involving crimping the fibres, is used for duvets. Good levels of comfort are claimed for the products, which are being supplied in the UK by T & T Marketing of Watford.

CONTACTS: DCA Technology: UK, 0420 84068; Siemens: UK office, 0632 752223; Image Inspection: London, 748 5888; T & T Marketing: UK, 0823 53214.

## Anxious wait for the 'Big Three'

The US Federal Trade Commission is expected to rule soon on whether General Motors, Ford and Chrysler can join forces to research the uses of plastic composites in the motor industry.

The FTC's decision - either to approve the collaboration, or ban it on anti-trust grounds - is awaited by the country's "Big Three" auto makers with considerable anxiety.

General Motors now stands at the brink of a "world first" venture into producing a plastic-bodied passenger vehicle, a van-like "people carrier" code-named GM-200, in the unprecedented volume of up to 225,000 units a year. And GM, Ford and Chrysler, like their rivals in Japan and western Europe, are becoming acutely aware that advanced plastics could revolutionise car manufacture by the late 1990s.

The US producers' anxiety arises from bitter memories of intended collaboration on a crucial area of con-

cern to the industry, exhaust emissions research. Co-operation of any kind was banned by the FTC under America's stringent anti-trust legislation in the early 1970s.

The delays, financial penalties and other disadvantages associated with the consequent duplicated research had the effect of holding back the US producers while a concerted and co-ordinated development programme was being carried out in Japan.

This time, the US manufacturers assert, the FTC should take more account of the internationally competitive climate in which the national industry has to operate. According to a GM spokesman, the necessary research would cost each of the manufacturers a third of the amount it would take to carry it out individually. "That is the way the Japanese

do it." They believe their chances of approval will be helped by the nature of some of the research they want to undertake - for example, into the environmental consequences of a switch to polymer-based composites by the world's single largest manufacturing industry.

The speed with which plastic composites have been developed and the many forms they take mean that no adequate databases exist yet on the materials, according to senior executives at Ford. Yet the importance of the composites is such that they could displace steel or aluminium completely in car bodies by the turn of the century - little more than two car generations away.

This view marks a change in attitudes from even a couple of years

ago, when it was thought likely that the principal role of composites in car bodies, or at least those built in high volumes, would be to provide easily changeable panels to be attached to steel or aluminium "skeletons". The latter would provide most of the car's structural strength, as is the case with GM's GM-200 van.

However, both Dow Chemical and General Electric's composites subsidiary, GE Plastics, now stress their conviction that lighter, stronger skeletons can be produced from composites at costs competitive with those for metal.

Both companies are already closely involved in composite vehicle development. Dow is one of the suppliers for the GM-200 and both companies have played a key role in BMW's new Z-1 sports car to be launched shortly.

The Z-1's vertical body panels are being supplied by GE Plastics' Dutch-based European subsidiary, while Dow is supplying its bonnet, boot and other horizontal panels.

GM's Pontiac and Chevrolet divisions are preparing to start joint production of the GM-200 in the first quarter of next year at a plant in Tarrytown, New York state.

Production methods will build on those pioneered in the Pontiac Fiero, a mid-engined sports car. At the peak of the car's popularity, Pontiac was building 100,000 Fieros a year. It proved that the Fiero's construction of steel cage and bolted-on composite plastic panels - a thermoset composite called SMC - was viable for medium-scale production runs.

Falling sales led to the Fiero being killed off earlier this year. But the production concept, over which GM encountered no serious problems, has been developed further thanks to relatively low tooling costs.

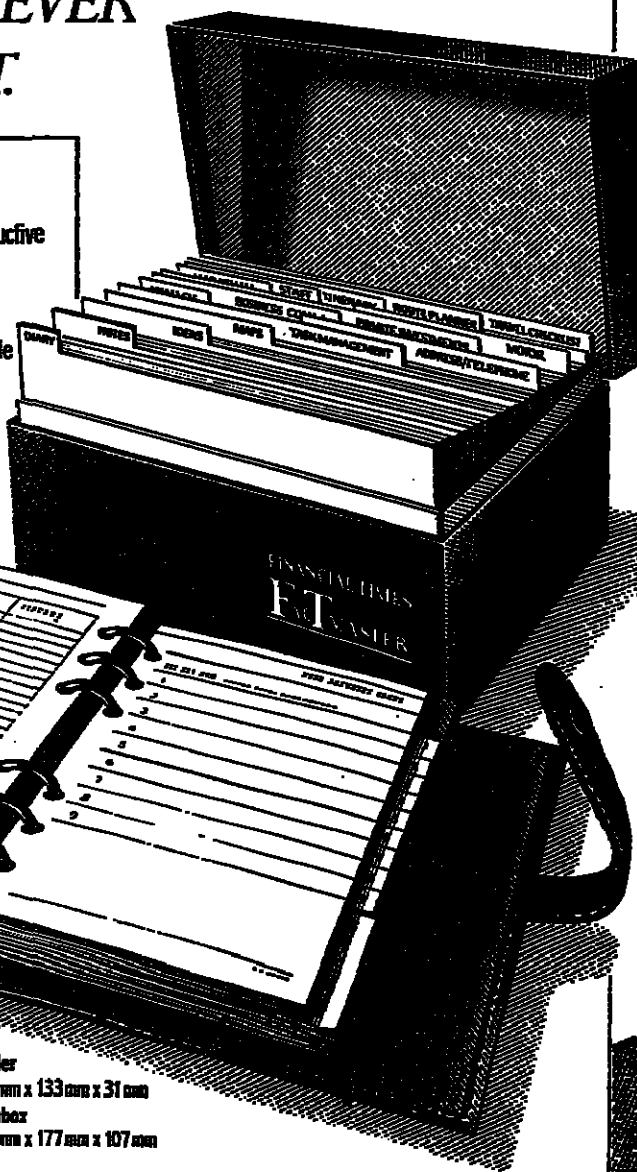
# TIME IS YOUR MOST PRECIOUS RESOURCE. FACTMASTER HELPS YOU MAKE THE MOST OF IT.

YOU'LL WONDER HOW YOU EVER MANAGED WITHOUT IT.

## DO YOU...

- spend too much time in unproductive meetings?
- try to carry too much information in your head?
- always seem to be surrounded by notes and unrelated scraps of paper?
- find it difficult to delegate tasks which you feel you can complete better and faster yourself?
- find yourself constantly dealing with minor queries from others?
- feel "lost" without your secretary?
- put off potentially difficult tasks because the information you need is not at your fingertips?

- find it difficult to plan holidays well in advance?
  - feel that overseas trips are less productive than they should be?
  - not enjoy your job to the fullest?
- These are all symptoms of inadequate personal organisation and task management, resulting in inefficiency, poor performance and lessened job satisfaction.
- If only half of them apply to your workstyle - you need Factmaster.



## WHAT IS FACTMASTER?

FT Factmaster is a flexible, yet carefully structured system of personal organisation and time management that adapts itself to your specific needs.

With a very small investment of your time, your personal effectiveness will be transformed - you'll meet deadlines, stay ahead of the game and those around you will respond more positively towards their own tasks and objectives when they see the example you set.

## FACTMASTER HAS THREE MAIN FEATURES:

Firstly, there is the portable ring binder which allows you to take everywhere only those pages or sections you really need on any particular day. Secondly, there are 6 different printed sections which you can use to load your Factmaster in the way that suits you best.

Diary Section - includes a full year's page-per-day diary starting in the month of your choice.

Travel Section - contains sheets for business expenses, travel itineraries, route planners, travel checklists, motor running expenses and business contacts.

Task Management Section - The Financial Times' own practical and highly efficient time management system. Includes task priority indexes, task overviews, sub-task/action/timetables and work load charts.

Binder  
183mm x 133mm x 31mm  
Datebook  
127mm x 177mm x 107mm

Analysis/Private Investment Section - includes tables to monitor shares, overseas investments, insurance and year-end summaries, analysts sheets and graph pages in metric, imperial and logarithmic scales.

Address/Notes/Staff Section - pages enabling you to instantly jot down every conceivable note, idea, telephone number or staff record you may wish to store.

Starter Pack - consists of all the main tabs, 14 international city centre maps, London and UK maps plus all the basics for a full task management system.

Thirdly, there is the desk top databox designed to store your completed, spare or alternative pages.

If personal organisers are new to you, we recommend you buy the Complete Set plus binder of your choice for the most cost-effective introduction to the full Factmaster system.

## THE UNIQUE FACTMASTER TIME MANAGEMENT SYSTEM.

The Time Management section is a powerful tool, guaranteed to keep your projects moving forward on time and according to plan. Programming is simple and logical. Major tasks and objectives are entered into the system in order of priority with start/finish deadlines. They are then divided into sub-tasks and entered together with an action plan and timetable.

At the end of each working day, actions for the following day are listed and recorded in the Diary/Daily Plan pages. This is the system's link to the next day. The progress of all tasks is monitored automatically and new information is entered as it comes to hand.

## AN INVESTMENT FOR LIFE... A PLEASURE TO POSSESS.

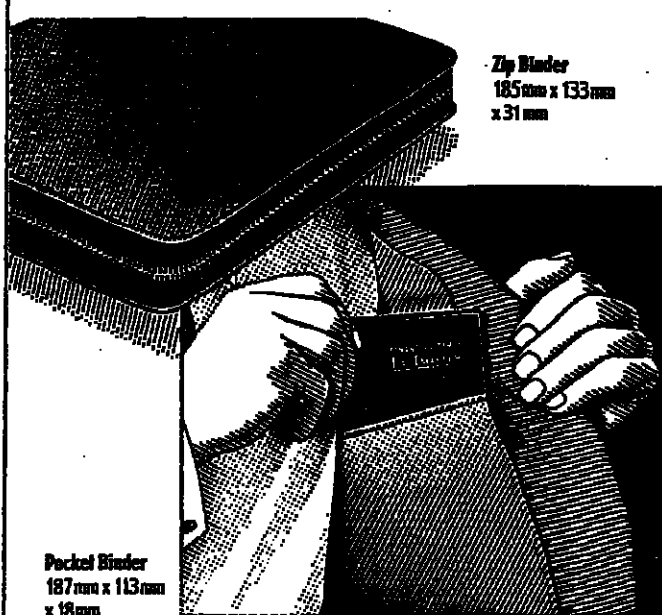
As you would expect from the Financial Times, not only is Factmaster an invaluable business aid - it is stylish and elegant in its own right, produced to a quality which we believe to be far superior to anything else on the market.

### A top quality range of binders

Available in six different black binders, only the finest materials and craftsmanship have been used throughout. Our superb range of leather binders have been especially created for us by Andrew Soos - a leather craftsman of international repute who also produces goods for Harrods and Aspreys.

If you demand the best, choose the top of the range zip-up binder in superb soft patterned leather, with real gold-plated rings, two front pockets and a pocket in the back with space for credit cards. The same design is also available with a traditional tab fastening either in the same soft leather or alternatively in luxurious, smooth, cow hide.

For style and economy, there are Factmaster binders in a more traditional hard-wearing leather or superior simulated leather. These have black rings, one pocket in the front and back and tab fastening.



Pocket Binder  
187mm x 113mm x 18mm

And finally there is the classic slimline pocket-size binder in smooth black cow hide with real gold-plated rings, and pockets for bank notes and 8 credit cards.

The Factmaster Databox is also an asset to any desk. This stylish black box with elegant gold embossing and hinging is designed to store and organise your completed, replacement and spare pages, and comes complete with its own FT pink section dividers.

## PERSONALISED WITH YOUR INITIALS

For a modest additional cost, the cover of your Factmaster binder can be gold-blocked with your initials.

## THE BUSINESS GIFT THAT MEANS BUSINESS

If you are looking for a business gift that is original, practical, highly memorable and reflects the prestige of your own company, you've found it!

You only have to imagine your own reaction to receiving a Factmaster as a gift, to appreciate the impact it would have on your most valued clients and staff.

Generous discounts available Factmaster is a highly prestigious business gift and, as such, we realise that you may wish to be selective about who you give one to. For this reason "bulk" discounts start at as few as 25 items.

The new FT Collection full colour catalogue illustrates how the FT Factmaster is just one range of superbly crafted items in the new FT Collection. Other items include the prestigious range of FT diaries, the new extensive selection of FT Essentials for the boardroom and the stylish FT Wall Calendar - destined to be the most sought-after gift of the year!

Please send me further information about Factmaster and the new FT Collection, together with an order form. ☐ Please tick if interested in more than 25 items.

Name (Mr/Ms/Mrs/Ms)  
Position  
Company  
Address  
Telephone

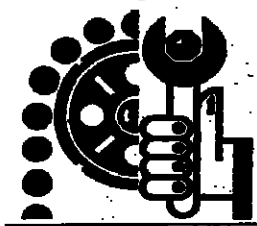


A TRADITION OF EXCELLENCE

Financial Times Business Information Ltd.  
7th Floor, 50-64 Broadway, London SW1H 0DB Telephone: 01-799 2002



# FINANCIAL TIMES SURVEY



Although the inquiry into the Piper Alpha disaster means that the year ahead will be a difficult one, the

industry is unlikely to be thrown off course, writes **Steven Butler**, the author of this survey. Companies believe that North Sea oil will be profitable for many years to come.

## Confidence returns

A SURVEY of Britain's oil industry six weeks after the Piper Alpha disaster, which claimed 167 lives, cannot fail to examine the implications of this worst accident in the history of the offshore industry.

It was the most important single event in the industry this year, and perhaps for many years.

Repercussions from a disaster of such magnitude, with insurance claims likely to exceed \$200m, are certain to be felt for a long time. It will raise costs for operations in the North Sea, and obviously lead to more rigorous safety and design standards for manned production platforms.

Yet in truth there is little more one can say about precisely what those repercussions will be than was apparent in the days immediately after the explosion on July 6.

The safety record of Occidental Petroleum, operator of the Piper Alpha field, and the entire oil industry has come under intense scrutiny, with incidents of obvious lapses dredged up, sometimes with great relish, for public consumption.

It is right that this should take place and that Occidental and the oil industry should be called upon to defend their

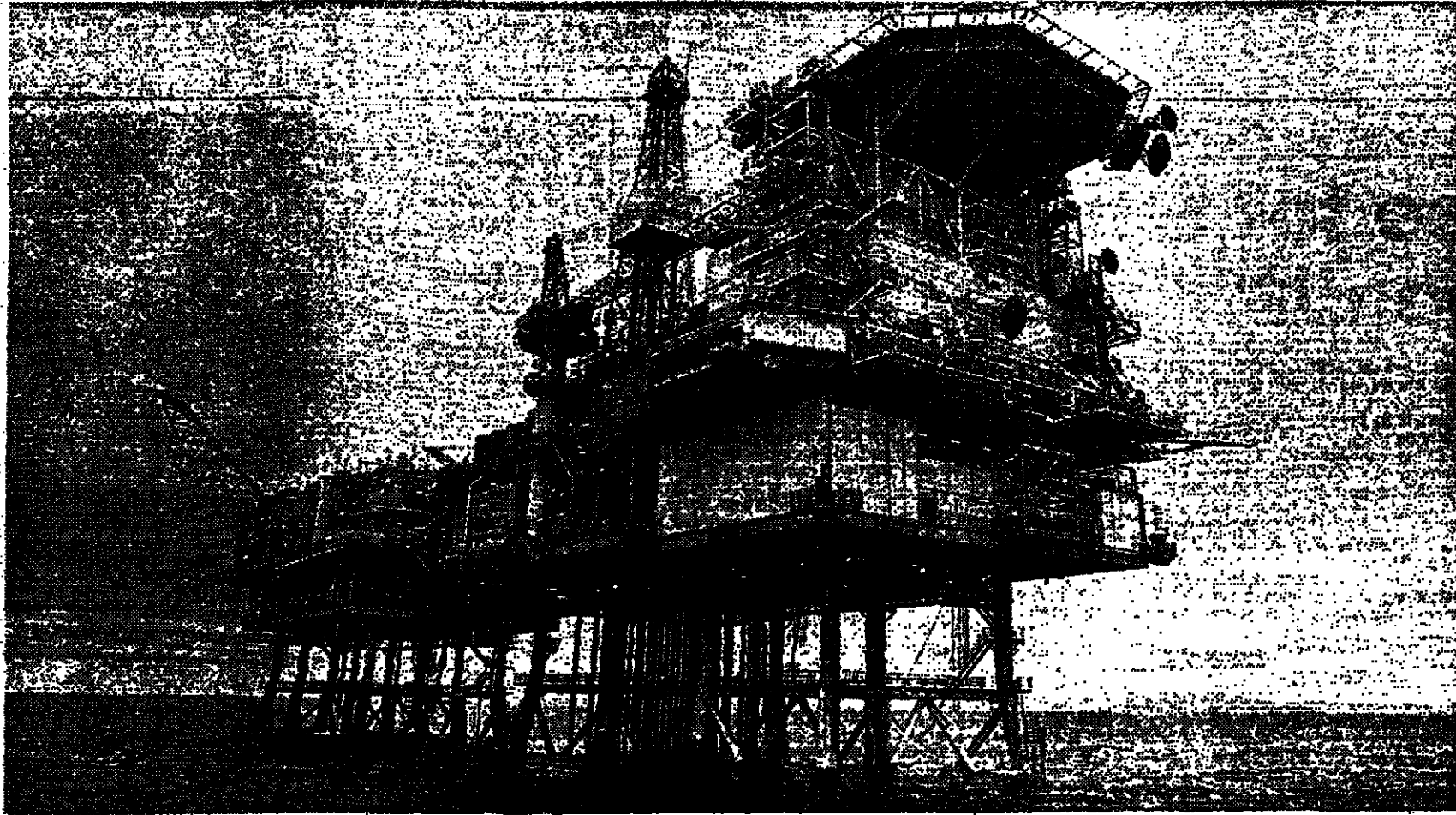
record. It is plainly unacceptable that 167 men should die in an accident that most experts in the industry admit they thought was a remote theoretic possibility.

In the end, however, the recitation of repeated incidents and accidents, which all operators have experienced, can shed little light on the Piper Alpha disaster until understanding of its causes has advanced beyond the initial statement that the explosion appears to have begun in a gas compression unit. This is currently under examination by a technical inquiry led by the Department of Energy.

And the broad safety performance of the industry is unlikely to be properly judged until the entire record is set before the public inquiry in Aberdeen and sifted through with proper technical advice.

One conclusion that emerges from the collection of articles in this survey is that the oil industry is unlikely to be thrown far off course by what has happened.

A far worse economic crisis, though obviously less tragic in human terms, hit Britain's oil industry with all the ferocity of a severe tropical depression in 1986, when oil prices rapidly collapsed from



## The UK Oil Industry

peaks of over \$30 a barrel to less than \$10 a barrel.

In 1988, with the dollar having fallen from its once lofty perch, oil prices are not much better in sterling terms. Yet rather than move to retrench, slash budgets and cancel projects, the oil companies are stepping forward rapidly with excitement and a confidence that the North Sea will prove an excellent place to explore for and produce oil for many years to come.

Since the Piper Alpha explosion, both Amerasia Hess and Enterprise Oil have made big North Sea asset purchases, and the disaster seems to have had little impact on prices.

When British Petroleum bid for Britoil late last year, in what became a £2.5bn takeover, it touched off a virtual scramble among oil companies to build up a position in the North Sea before all the freely available parcels of assets are gone.

BP, Atlantic Richfield, British Gas, Elf Aquitaine, and London & Scottish Marine Oil Company (Lesmo) have all significantly augmented their

positions; while Repsol, the Spanish oil company, walked away disappointed when Enterprise pre-empted an agreed deal with Texas Eastern. Repsol says it has not lost interest, and corporate finance specialists say a number of other deals are currently in the works.

Why this resurgence of interest in the North Sea, when UK production is set to decline irreversibly and at a time of weak oil prices to boot? What has happened cannot simply be explained as renewed confidence that oil prices are set to rise again, because there is no such confidence.

The simple answer is that confidence has blossomed that there is plenty more oil to be found in the North Sea, that the fiscal and political atmosphere will continue to be friendly to oil companies, and that technological processes will make it possible to produce oil ever more cheaply.

Mr Basil Butler, a managing director of BP, recently said BP believed another 80m barrels of oil remained to be discovered in the UK continental shelf, or

roughly half as much again as had already been found. It is a new, more optimistic, estimate that takes into account the recent exploration experience of oil companies.

The impact of Chevron's discovery of oil in the shallow eocene layers of the Alba field are continuing to reverberate through the oil exploration community. The reservoir, currently believed to contain some 300m barrels, with further increases still possible, is virtually invisible to the seismic eye.

It was found by accident, after being drilled through numerous times without realisation that an oil reservoir had been penetrated. Geologists throughout the industry are dusting off old seismic studies for hints that something may have been missed in older, heavily explored licence blocks.

The experience of Enterprise Oil is another telling lesson that hidden riches remain to be found. Enterprise found a 300m barrel reservoir in the Nelson

field, after acquiring licence interests from partners who disagreed with Enterprise's interpretation of seismic data. The block had been under exploration for 20 years.

The search for oil is likely to be assisted by continued improvements in seismic resolution and, more important, by better computer techniques to analyse the mountains of raw data produced by seismic studies. Geologists have also accumulated an ever more complete picture of the layers of earth below the ocean.

Added to the excellent prospects for finding more oil is a perception throughout the industry that realistic planning is possible because of Britain's political stability. In some other regions of the world, oil companies must work with extreme nationalistic or unstable governments.

The Government's interest in oil production is twofold: to maximise tax revenues, and to maximise the broad economic benefits accruing from UK oil production.

These goals have been pursued in a pragmatic fashion, with the Government recognising in the end that oil companies must have the promise of substantial profit to compensate for the high risks of North Sea oil exploration and production.

The fiscal regime has proved highly responsive to fluctuating oil prices, so as not to discourage exploration excessively when cash flow from oil production declines.

The Government's pragmatic approach was well illustrated following the Chancellor's Budget speech in April, when he altered the allowance system for gas fields in the southern gas basin in order to tax fields based on profitability, and thus encourage development of more marginal fields.

The Treasury agreed to alter details of the scheme after oil companies had argued that the terms were set too tight for some producing fields. This sort of response helps to boost confidence among oil companies that they will not be

### CONTENTS

The independent companies	
The service industry	2
The supply industry	
Scotland's recovery	
Project management	4
The fabrication industry	
Technology	5

Picture (Ashley Ashwood): The Thistle Field, operated by Britoil, subject to a £2.5bn takeover by BP this year

driven arbitrarily to an impossible position.

Finally, as the articles in this survey make clear, Britain's oil service and supply industries have made a remarkable response to the constraints imposed by both lower oil prices and the smaller size of future development projects in the North Sea.

In the space of two years, the cost of operating there has plunged by roughly a half. This is partly a response to the forces of supply and demand, with service companies forced to slash prices as the level of work dropped off.

But many service and supply companies have learned how to make a profit at these lower levels by vastly improving management, with an eye to reducing costs at every juncture. Fat has been squeezed out of the industry, and the surviving companies are far more fit to compete, both at home and abroad.

To this has been added a surge of inventiveness as the industry seeks ways to reduce development costs by applying technology. A true industrial ferment is now taking place, which has brought the oil companies together with some of the most famous names in British engineering.

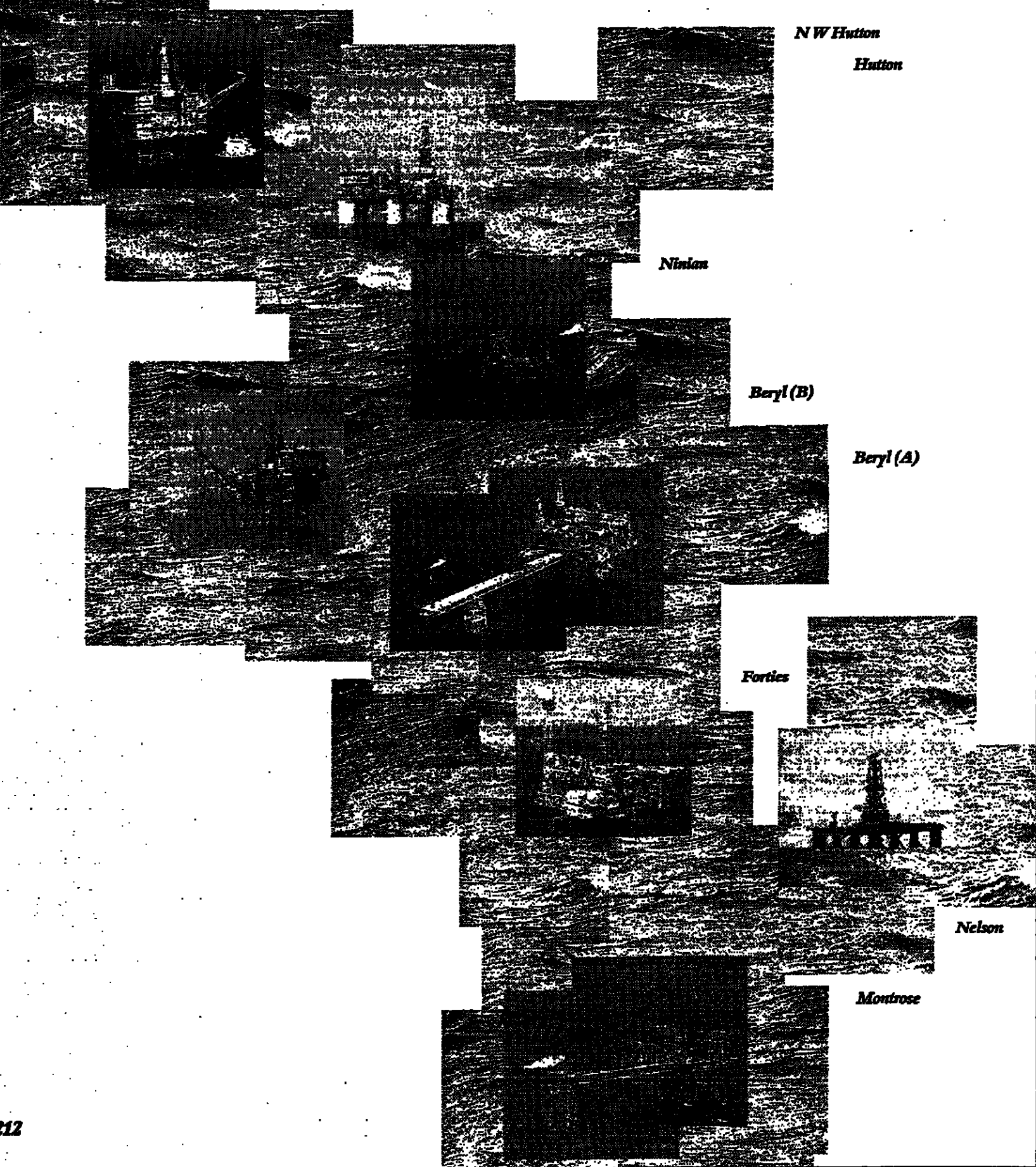
New products are being developed for the extremely harsh conditions of the North Sea, and this has put many British companies on the edge of technology worldwide. This promises to take British companies to new markets, both in the international oil industry and in non-oil related industries where the technology can be applied.

The next year will be a difficult one for the UK oil industry, as the public inquiry into Piper Alpha disaster puts it under intense public scrutiny. Dirty linen will be found, and there will be embarrassment because much of it will be presented without being put into context. The outcome of the inquiry is certain to have a significant effect on the course of the industry. But the momentum of change and innovation now is too great to be seriously diverted.

**Britain's largest  
independent  
oil exploration  
and  
production company**

**Enterprise Oil**

A copy of the annual report can be obtained from Julian Wade,  
Enterprise Oil plc, 5 Strand, London WC2N 5EU Telephone 01 930 1212





## UK OIL INDUSTRY 2

The independent sector is dwindling. Does it still have a role?

## The case for small players may be difficult to prove

THERE IS something mildly refreshing in the attitude of Presidio Oil, a US oil independent that is building a substantial company by acquiring oil-producing properties which it believes it can operate at a profit.

When Presidio reaches a certain critical mass, say when it is capitalised at \$500m, Mr George Giard, chairman, fully expects to be taken over by a big oil company looking for a significant addition to its oil reserves.

One would be hard pressed to find a similar sentiment among similarly-sized British companies, for whom staying independent appears to border on a moral imperative.

There are of course the usual arguments in favour of the sector - that the addition of a number of smaller players adds diversity, increases competition and leads to the discovery of more oil. The independents also argue that they are good at discouraging the gold-plating habits of their bigger partners in exploration licence blocks.

These arguments, in the end, are difficult to prove, even in the case of Enterprise Oil, which took the bold and risky step of acquiring a 100 per cent interest in a licence block late last year, and proceeded to find 300m barrels of oil where other companies had thought there was none.

Perhaps the oil would have been found eventually, possibly by Shell, which sits over the same structure in a neighbouring licence block.

But it was Enterprise that found the oil, a fact that in the end was less important as an argument in favour of keeping an independent sector than as one in favour of owning Enterprise shares, which have put in a sparkling performance this year. Market capitalisation has risen to roughly £1.6bn, making Enterprise a very substantial company.

With the management's reputation as dealmakers now enhanced by a record of actually finding oil, its shareholders will surely think twice before accepting a stingy offer from a predator, particularly one based on a discounted future cash flow valuation of the company's proven assets.

Enterprise has now shown it is capable of enhancing the value of those assets.

Enterprise's shareholder loyalty could well be put to the test in the coming year as a complicated chain of shareholdings unravels following the decision by RTZ, the mining group, to leave the oil exploration and production business.

RTZ sold its own portfolio of assets to Elf Aquitaine, the French oil company, in a \$200m deal, but it continues to hold a 29.8 per cent stake in London & Scottish Marine Oil (Lasso).

RTZ now intends to sell the Lasso stake. Precisely how this sale takes place is likely to determine the structure of the UK independent sector, or indeed whether a significant independent sector survives. It has already dwindled rapidly

in the wake of the takeovers of Britoil, Tricentrol and Acre Oil. Acre, in fact, lasted less than two months after it was floated on the Stock Exchange before it was taken over by British Gas in a \$270m agreed deal.

Predators have put a high value on acquiring North Sea asset portfolios because it is unlikely that similar portfolios can be assembled from scratch, while there is still plenty of oil to be found in the North Sea.

As part of its agreement with Lasso, RTZ cannot sell its stake as a block until July 1989, unless the Lasso board approves the sale or a predator wins control of the company. Otherwise, RTZ can sell the stake only in 5 per cent chunks.

In the three months since RTZ became a seller, a buyer for the stake acceptable both to the Lasso board and RTZ has not materialised. This is probably because almost any buyer of the 29.8 per cent Lasso stake at current prices would want to control Lasso, which wants to stay independent.

Mr Chris Greentree, Lasso chief executive, is in a difficult position, because the highly respected management that he helped assemble is likely to become restless unless the future of the company can be resolved. But preserving independence will be no mean feat. A key attraction to any predator, of course, is the strategic 25 per cent stake in Enterprise. Acquiring that could be a first step to mounting a successful takeover of Enterprise. This

might suggest that Lasso should offload the stake to discourage predators, but if it did so, part of the premium in its own share price would vanish and this could make Lasso more vulnerable to a predator.

The possibility of a merger between Lasso and Enterprise has often been mooted, and there would be plenty of logic in combining Enterprise's strong position in the North Sea with Lasso's international holdings. But neither company seems keen.

In the event, Lasso appears to be playing a waiting game, hoping RTZ will go for immediate cash by selling 5 per cent stakes, rather than wait for a year to realise the full strategic value of its 25 per cent holding.

Lasso could just scrape through the next 12 months and still be independent. Looking at its exploration and production programme, and its balance sheet, there is no reason why it should not.

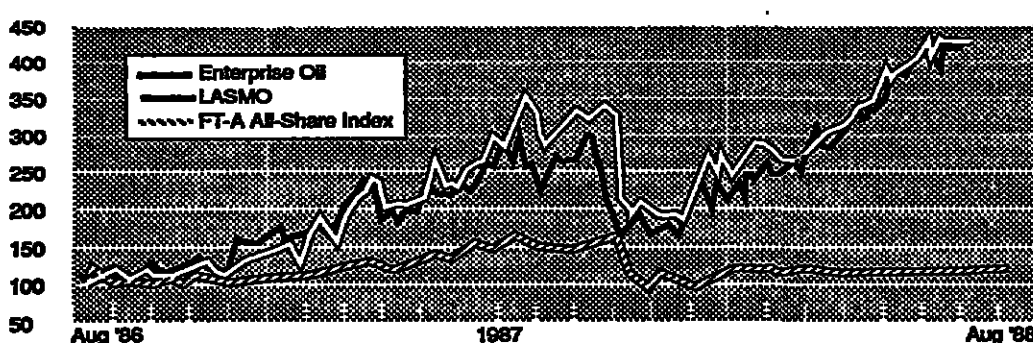
It is often said that stock markets cannot value oil assets properly because time horizons are too short, thus leaving the sector vulnerable to takeovers by big oil companies willing to take a long view. This argument was particularly in vogue in the case of BP's \$2.5bn takeover of Britoil, widely reckoned to be something of a steal. But neither Britoil nor Tricentrol, which fell soon afterwards to Atlantic Richfield of the US for \$187m, had something that Enterprise or Lasso evidently have in abundance - happy shareholders.

The bids for Britoil and Tricentrol represented welcome relief for investors that had gone seriously wrong for their shareholders, and the only real question was how to finesse the best price out of them.

Enterprise and Lasso have delivered to their shareholders, as have, to varying degrees, Premier Consolidated Oil, Clyde Petroleum, Sovereign Oil and Goal Petroleum.

Of course, happy shareholders are not a short defence against a predator willing to pay over the top for assets. But, in the case of Enterprise, why should they be?

## Oil shares beat the index



OCCIDENTAL PETROLEUM's Piper Alpha platform exploded in a fiery inferno on July 6, killing 167 oil workers. It was the worst accident in the history of the offshore oil industry. The explosion is thought to have originated in a gas compression module. Technical causes of the accident are being investigated by a Department of Energy team. This will be followed by a public inquiry.

## THE SERVICE INDUSTRY

## Flexibility assists revival

IN THREE dreadful months of 1986, Mr Ian Wood, chairman of the John Wood Group, saw his company's revenues plummet by a third.

When the oil price collapsed, oil companies operating in the North Sea slashed expenditures on exploration and development to compensate for sharply reduced incomes. Mr Wood's company, which provides a wide range of services to the offshore oil exploration and production business, took it on the chin.

The experience was not unique. Like other companies in the offshore service industry, Mr Wood cut his staff by 10 per cent, and let one in five of his contract workers go. Yet today many of the same companies that were shaken so severely in 1986 have seen profits restored and are expecting to grow strongly.

Full employment has returned to Aberdeen and companies are finding it difficult to recruit skilled workers. "It is remarkable how much of the industry is intact," says Mr Keith Maier, the Aberdeen head of Investors in Industry (SI), the investment group owned by the clearing banks and the Bank of England.

Although there has been a spate of mergers in the industry, little capacity has been permanently lost. The companies hit hardest were those carrying heavy capital investment on the books, particularly drilling contractors with expensive semi-submersible rigs forced to sit idle.

Mr Maier attributes the survival of so much of the industry to the flexibility of companies and their workforces. Many workers agreed to pay cuts rather than lose jobs.

Nevertheless, a significant number were sacked and scared away by the cyclical nature of the business.

"We've lost a lot of people for good out of the business," says Mr Edward Lorimer, managing director of Hunting Oilfield Services, which has a range of engineering and manufacturing capabilities for offshore installations.

Most in the industry now believe that the downturn set in motion by the 1986 price collapse has bottomed out, and growth is on the horizon.

This year the John Wood Group expects profits to approach the record of \$4.8m set in 1985, or being more than halved in the intervening two years.

Perhaps the significant, the steep decline in the international oil business did not deter Mr Wood from a planned expansion into the US drilling services industry. The acquisition of a drilling equipment manufacturer in January 1986 was, to say the least, ill-timed.

Mr Wood admits he made all the mistakes, buying the wrong company at the wrong time, at the same time moving into new products, with a new management, in international markets.

Yet after a year and a half of what Mr Wood describes as "crisis management," the US operation is profitable, fattened up by two additional acquisitions last year that Mr Wood is confident about.

The John Wood Group is now the fourth largest drilling service company in the world, although still a long way behind the international giants, Schlumberger, Halliburton and Dresser Atlas.

The Wood Group's experi-



Mr Ian Wood: US expansion has proved profitable

ence is echoed, with varying degrees of pain, by most other survivors in the sector. Hunting had the bad fortune to have embarked on its international expansion in 1985, building new facilities in Norway and Holland just before the market collapsed.

The full impact of the downturn hit the company in 1987, when annual revenues fell 35 per cent below the 1985 record of \$22m, and Hunting was forced to retrench sharply. The new facilities were closed in Norway. The company's original base in Great Yarmouth was shut down. The Houston office was closed and US operations consolidated in Lafayette, Louisiana. The company's Singapore staff was cut sharply.

Now business is running once again at 1985 levels, and the company is looking to expand its specialist connector

business for use in offshore work.

It is the drilling contractors that are still bearing the brunt of the downturn, with rig rates for semi-submersibles, at about \$18,000 a day, barely covering operating costs, when work can be found. Only jack-up rigs, working in the shallower southern gas basin, are in strong demand.

All three of Jensen Drilling's semi-submersible rigs are sitting idle still, and Mr Jim Murray, finance director, sees the company's future in the production contracting business. A project with Sovereign Oil to develop the Emerald Field is awaiting Department of Trade and Industry approval for the provision of subsidised finance to convert a semi-submersible rig to a production vessel. Without subsidised finance the work would not be feasible in the UK.

UK suppliers now win 87 per cent of North Sea orders, and . . .

## Opportunities transcend oil

WHEN EXPLORATION first began in the North Sea, no companies had produced oil in quite so hostile an environment, in water so deep, turbulent and cold.

While this set an expensive challenge to the world's oil industry, it also handed an opportunity to British industry.

The broad success of the response is impossible to gauge, because the complex range of heavy and sophisticated equipment that goes into oil exploration and production produces demand that is felt throughout industry, from steel companies to manufacturers of electronic components, many of whom may be unaware of where their goods will be used.

Government statistics show that British suppliers now win about 87 per cent of orders stemming from North Sea development work, an impressive advance from the early days.

But how much of this results from the free choice of North Sea producers, and how much from the direct and indirect influence of the Offshore Supplies Office, is hard to gauge. No North Sea oil explorer believes it is possible to be successful in future licence awards for North Sea acreage without patronising British industry.

Indeed, support for British

research and development was made a condition of the ninth round of licence awards in 1984. Although pressure from the European Commission led to this explicit condition being withdrawn, no one would say the score has really changed.

It is none the less clear that a number of companies have taken advantage of the opportunities.

Ruston Gas Turbines, a GEC subsidiary, has a dominant position in the world market for powering oil pumps, with 80 per cent of sales overseas. Weir Pump's innovative pump designs, aimed at coping with the very high pressure requirements on the North Sea in the early 1970s, have found broad international acceptance in the oil industry.

Even more interesting are the companies that have branched out by finding new uses and markets for technologies developed for use in the North Sea.

Weir's downhole turbine-driven pumps have found a welcome use in some deep water-well applications. The pumps are driven by the fluids that are produced deep below the surface of the earth.

The Balmoral Group has made a success of exporting flotation devices for marine and offshore usage. Osprey Electronics is now selling its underwater cameras, developed mainly for offshore oil

installations, successfully in defence industries.

Few companies however can have been quite so prolific as the Pressure Products Group. Pressure Products (formerly known as Gas Services) has grown out of the invention of a simple valve in 1981 that channels exhaust gases out of a diver's helmet, allowing helium to be extracted on the surface and recycled.

With helium costing £120 per cubic foot, the savings can amount to £4m a year for the average North Sea diver. The equipment has since become standard kit for saturation diving operations around world, in both commercial and military operations.

Pressure Products has since used its expertise to develop other products. One is a bail-out system for deep-water diving operations. This is a simple recycling system that would give a 15 minutes of gas at 1,500 feet in an emergency, during which time he could presumably retreat to the safety of a diving bell. Because of high pressure at these depths previously existing emergency equipment would have provided just seconds of air. Diver trials are now going ahead at previously unheard of depths of 2,000 feet.

Other products include cheap, high-pressure oxygen chambers for medical usage, emergency air supply equip-

ment for fire-fighters, and a new 18-inch diameter remote operated submarine vehicle that contains three cameras. The device, which looks more like a toy than a tool, puts off-the-shelf video and still cameras on an axle that rotates 360 degrees vertically inside a plastic viewport to enable remote inspection of underwater structures, ships and boats.

Pressure Products hopes to bring the price down to \$15,000, from a current \$25,000, to enable it to become standard kit for marine inspection use, the sort of equipment that any large commercial vessel, or even a few exotic pleasure craft, just could not do without. The closest competing equipment costs about \$50,000.

Already, Pressure Products has managed to shift its business so that it is only 40 per cent dependent on the oil industry, and it hopes to lower that dependency further to 25 per cent.

The world's oil tools and equipment manufacturing industry is still dominated by foreign, mainly US companies, and that is unlikely to change.

But as the technological requirements for future North Sea developments become more stringent, owing to the need to use technology to save money on smaller fields, the opportunities for British industry will also grow, both in and out of oil-related markets.

## STEER A STEADY COURSE THROUGH THE CRUDE OIL MARKET



Highly volatile oil prices have created the need to manage price risk. Now the IPE's Brent Crude Oil Contract provides the missing link because it's the only crude oil futures contract based upon an internationally priced crude oil which trades in the European time zone and overlaps with the Middle East, Far East and US trading day.

Because Brent is a price marker crude it provides price risk management and trading opportunities not only for Brent but also for other price-related international crudes. What's more, the IPE contract size of 1,000 barrels facilitates hedging not only of cargo sizes but also of smaller parcels too. This also helps the product trader who wishes to hedge a product package against the crude oil price.

The IPE is a Recognised Investment Exchange under the UK Financial Services Act and its contracts are cleared and guaranteed by the International Commodities Clearing House.

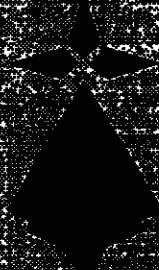


So contact us today for an Information Pack -  
The Marketing Department, International House, 1 St. Katharine's Way, London E1 9UN  
Tel: 01-481 0643 Fax: 01-481 8485 Tlx: 884370





The new major  
independent.  
Now operating  
in the UK.



# KELT

**KELT ENERGY PLC**

20 FERRY STREET LONDON SW17 4UJ Telephone: 01-873 5861 Fax: 01-873 0908 Telex: 920354

UNITED KINGDOM ■ UNITED STATES ■ FRANCE ■ INDONESIA ■ GABON



## UK OIL INDUSTRY 4

Piper Alpha has taken the bloom off Scotland's recovery from recession, reports James Buxton

## Efficiency counts as the whirlwind passes

SOME PEOPLE might think of the Piper Alpha tragedy as an event affecting a force of anonymous workers who converged on the platform from all over Britain for their two weeks on, and who faded into the background of the UK when they went on leave.

But the majority of the 167 men who died came from Scotland, many of them from Aberdeen, and north of the border the disaster is regarded as a tragedy for the whole of Scotland.

For although North Sea oil production and exploration take place out of sight and over the horizon, the industry is deeply embedded in the Scottish economy. In towns and villages far from Aberdeen almost everyone knows someone who works "on the rigs". Furthermore companies involved in North Sea activities are found

all over Scotland.

The tragedy came just when Scotland was getting its confidence back after the shock of the 1986 oil industry recession. A spate of announcements about new development contracts promised a big increase in work for the surviving platform construction yards, and they are only the tip of the iceberg: they promise large quantities of sub-contract work and future contracts, and employment in the installation and servicing of offshore operations.

None of that work should be affected by Piper Alpha, but

the disaster takes the bloom off the recovery. Only a few months ago the citizens of Aberdeen were breathing sighs of relief that it was once again possible to sell a house without too much difficulty after two years of a deeply depressed market.

The oil industry is a major factor that differentiates Scotland from the rest of the UK. Its arrival in the early 1970s helped to soften the impact of the decline in Scottish heavy industry as it accelerated after the 1974 oil crisis. Aberdeen enjoyed a rate of expansion

unknown by almost any other British city.

Its population went up by 60,000 to 250,000 as US specialists and vigorous young men from all over Britain moved in to work on the oil platforms. Aberdeen's businessmen and professionals rapidly became accustomed to dealing with companies that were willing to spare no expense in their insistence on getting what they wanted when they wanted it.

What made the influx more substantial was the fact that the new prosperity hit a city that was already reasonably wealthy and experienced. It

was the centre of a rich agricultural region, as well as an important fishing port. Aberdeen's businessmen and professionals were better placed to cope than those of some other cities might have been.

Partly as a consequence of the oil boom, the north-east avoided most of the industrial decay and dereliction that affected other parts of Scotland. Indeed, an impressive spread of new businesses was founded. Had they been close to the central industrial belt of Scotland, they might have helped morale elsewhere.

Even so, the Glasgow area

benefited both through the spread of fabrication yards to the Clyde and the offshore work that was won by companies such as Weir Group, Howden and British Steel. Elsewhere the Moray Firth became an important concentration of offshore fabrication and repair work, and at remote Loch Kishorn in Wester Ross the solitude was disturbed by the creation of the Howard Doris concrete fabrication facility.

The economy of the Shetland Islands was transformed, for better or for worse, by the construction of the Sullom Voe terminal. A smaller explosion

hit Orkney with the Flotta terminal.

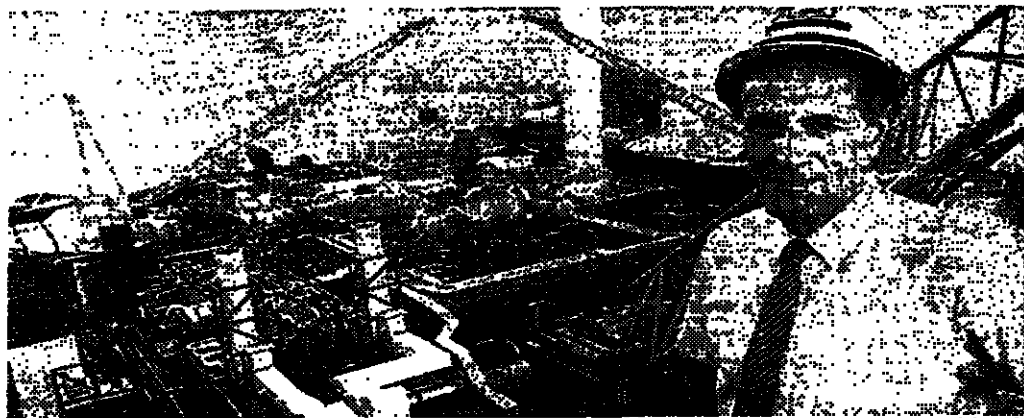
The sudden downturn which followed the collapse of oil prices in 1986 not only had a shattering effect on places like Aberdeen, whose experience of oil had been largely benign: it was also the major cause of the fact that, whereas the UK economy grew by more than 3 per cent in 1986, that of Scotland grew by only about 1 per cent that year. So surprise at the fact that Scots voted the opposite way from the English in the 1987 general election was perhaps overdue.

For a time the recession dev-

astated confidence in Aberdeen as the oil companies, themselves stunned by what was happening in the oil markets, abruptly shut off spending. Many offshore supply businesses survived only by the most ruthless slimming and efficiency campaigns. Some people who had done well during the fat years quietly departed, sometimes leaving it to the building societies to find a buyer for their houses.

But the whirlwind unleashed by the recession caused equally grave devastation elsewhere. The Loch Kishorn fabrication yard closure at the end of 1986 was followed in 1987 by the shutting down of UIE on the Upper Clyde, receivership for Kestrel Marine at Dundee and, earlier this year, the going on to care and maintenance of the Scott Lithgow yard on the

Continued on page 5



Dr Rex Gaisford with a model of the Amerada Hess floating production facility

## PROJECT MANAGEMENT

## A time-saving Epic

ANY OIL company faced with the prospect of developing a billion barrel field, with oil prices at \$30 a barrel and a strong dollar, would not worry excessively about minor details, such as a cost over-run of a hundred million pounds.

But if looking at less than 100m barrels, with oil at \$15 a barrel and a weak dollar, every bit hurts.

This is the sort of regime that many oil companies now find themselves operating under, and it has provoked a much more self-conscious approach toward the science, or art, of project management.

A project as complex as a North Sea oil development naturally passes through a number of well-established phases, from feasibility and government approval, to detailed engineering and design, procurement, construction, installation, drilling, hook-up and commissioning.

Then finally, after spending usually hundreds of millions of pounds over several years, oil or gas comes out of the ground which can be sold in order to begin to pay for these costs and, it is hoped, earn a profit.

Obviously, aside from savings that result from clever design of the hardware, the sooner oil can be produced after serious spending begins means more profits at the end of the day, other things being equal.

This is a question that the oil industry is now coming to grips with and many projects

under way, or at the planning stage, have in effect tried to collapse the stages so that the final project comes out faster.

This is the thinking behind an innovative contract signed earlier this year for Shell/Esso's £420m Sole Pit development in the southern gas basin of the North Sea.

Shell, operator of the fields, decided to award the contract on a turnkey basis, dubbed an "Epic" contract, which stands for engineer, procure, instal and commission. In essence, this means that the entire job, following from Shell's conceptual designs, was handed on to Brown & Root/Wimpey Highlands Fabricators in a single £100m contract.

Shell will take over again when the development is installed, commissioned and ready to operate. In the meantime Shell will station only about five of its own personnel at Hi-Fab to monitor what is going on, as opposed to the usual project staff of 70 or 80.

The use of a turnkey approach means that normal gaps between the phases turn into overlaps. Highlands Fabricators has already sent a project team to London to co-ordinate with engineers on the detailed design phase with the aim of coming up with a design that is easy to put together. Unlike the normal project, fabrication is scheduled to start just a few months after detailed engineering begins, rather than waiting until it is 80 per cent complete.

Shell believes that the approach will save a year, but there is also a risk. The company must be sure of its design concept because altering specifications midway would be extremely costly, if possible at all.

Responsibility for getting the project right rests far more heavily on the contractor.

Although the turnkey concept is obviously attractive, it may not be appropriate for all projects. BP, for example, believes that its Miller field project, where costs are likely to approach £11m, is too big and complex to hand on in an Epic contract. The Miller project is awaiting finalisation of a gas contract before applying for final government approval.

Humphreys & Glasgow, which is providing design, engineering and procurement services for the Miller field, is none the less aiming to narrow the gap between engineering and fabrication. The contract for fabrication is to be awarded on a "measured quantities and rates" basis, which would be an agreement on how to determine a final lump sum.

This will also allow for the contract to be put out to tender when the engineering is 70 per cent complete, and for work to start at that stage. A lump sum for the job would be fixed six months after contract award, when it is possible to cost the project down to the last bolt. These, of course, are still the



Amerada Hess floating production facility being fitted out in the McNulty Yard, at South Shields

relatively big projects. A good example of how to squeeze down costs in smaller fields is the Amerada Hess development of Ivanhoe/Rob Roy.

The basic concept is to use a converted, second-hand (and thus cheap) semi-submersible rig as a floating production facility for two small fields in close proximity. The two reservoirs have total recoverable oil reserves of 88m barrels.

The concept for the project was developed in 1985, and put on hold for a year when oil prices collapsed. During this

time another £35m was squeezed out of the cost, which ended up at £350m. Dr Rex Gaisford, project manager, cites other traditional fixed platform projects, designed for a similar capacity of 60,000 barrels a day, that cost twice as much.

The vessel, in the Sedco 700 series design, imposes another sort of discipline because of the tightness of the space available. Every bit of equipment brought on board the vessel, currently under conversion at Charlton Leslie Offshore in

South Shields, is weighed as is every bit taken off. This allows constant monitoring of weight to see that this critical factor conforms to planned specifications.

The entire topside assembly and nearly all commission can be performed in the yard, while the vessel is moored at Tees-side.

Meanwhile, wells and subsea templates are being drilled and installed on site, so that when the vessel is towed out next spring it can be hooked into the system of flexible risers and turned on. The wait for

drilling to be completed after installing a platform is entirely eliminated.

Production is anticipated to run for 12 years, after which there would be a primary phase of the huge abandonment costs that operators of fixed structures would face. And with a bit more refurbishment the vessel itself could well be ready to see duty at another similar project.

The ultimate in cost savings must be Sovereign Oil's plans for the Emerald Field, with reserves of 43m barrels. In this case Jebens Drilling would

convert one of its own rigs for production purposes, pump the oil on a per barrel fee and hope to continue in business as a production operator, currently subsided, after the field is depleted.

Even the oil output has been pre-sold to Neste of Finland for this marginal project, thus eliminating most sources of commercial risk that operators normally face.

The economics of this project, however, are so tight that the rig conversion cannot take place without financial support from the government.

The future still looks uncertain for fabrication yards

## More work, but more casualties

## Ivanhoe and Rob Roy on schedule:

## First oil Autumn 1989

Using subsea technology, Amerada Hess Limited's Ivanhoe and Rob Roy project will be the first to bring on-stream two oil fields through a floating production facility with full gas processing. This development incorporates many of the most up-to-date safety techniques and technological innovations.

Amerada Hess have been involved in the North Sea for 25 years and became an operator in 1983. With a rapidly expanding portfolio of interests in the U.K. Continental Shelf, the company is a significant and growing force in North Sea operations. Amerada Hess Limited is committed to further investment and expansion in exploration, new field developments and production operations.

AMERADA HESS LIMITED

HESS



APRIL WAS a gloomy month at Highlands Fabricators, the offshore fabrication yard to the north-east of Inverness at Nigg Bay.

The yard had completed and delivered the jacket it built for the Shell Eder field, the last of the orders from the boom years before the collapse of oil prices in 1986. Hourly employment at the yard had fallen to just 39 from a peak of 5,500 five years earlier.

Hi-Fab is the prime industrial employer in this otherwise farm-based economy and few people had money in their pockets to support the shops, restaurants and pubs that had sprouted up during earlier boom years.

Then suddenly fortune reversed itself. In the space of five weeks, Hi-Fab won five orders in succession. By late July, 750 hourly workers had been brought on board again, and the yard was still hiring.

Hi-Fab of course is one of the more fortunate yards. Fabrication yards, while playing a smaller role in the overall offshore supply and service business than in the past, are still the most visible tip of the industry, where jobs rise and fall erratically according to the unpredictable flow of new development work.

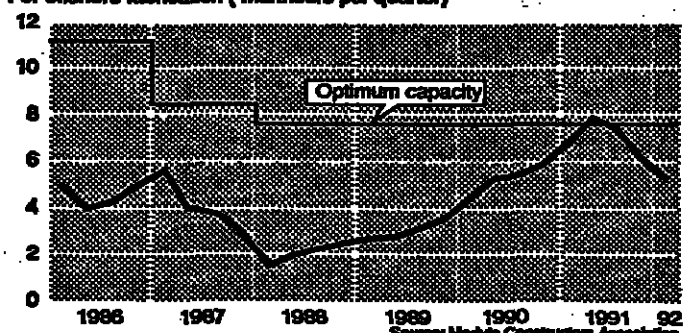
At least three yards did not make it through the 1986 downturn. Three others are on "care and maintenance," keeping equipment oiled in hopes of work picking up. Industry capacity has dropped by roughly 25 per cent in two years, and only about 30 per cent of remaining capacity is being used today.

Future projections show that work is likely to rise in the coming years but that competition between the yards will continue to be severe, and that more casualties will result.

The Module Constructors' Association (MCA) projects that work for the fabrication yards will continue to rise

## Manpower forecast

For offshore fabrication (manhours per quarter)



Source: Module Constructors' Association

until the second quarter of 1991 (see illustration). At that time the industry would be operating more or less at optimum capacity. The projection assumes a 10 per cent increase in plans for bringing development projects on stream, based on previous experience.

However Mr John Wood, deputy chairman of the MCA and a Hi-Fab director, says the report may be based on an excessively conservative assumption about productivity, namely that topside construction will require 150 manhours per tonne. He says that productivity gains are likely to prove this figure is 25 per cent too high.

Instead of reaching full capacity in 1991, the industry is likely to approach only 60 per cent of current capacity by that time, and the balance will probably have to be cut.

Fierce competition is likely between yards with capability to take advantage of opportunities provided by the heavy-lift crane barges that individually can handle loads of 10,000 tonnes. Bigger loads can be contemplated for barges working in tandem.

Most of the big yards are thought capable of handling this sort of work, with Highlands Fabricators, McDermott Scotland, and Fress Offshore

particularly well suited because of their assembly and deep water loading facilities.

The bigger load capacity means that bigger and heavier topside modules for oil production platforms can be built in the yard at a fraction of the cost of building small modules offshore and assembling them offshore, where labour can cost 10 times as much. The bulk of commissioning can also be completed offshore, eliminating the expensive need for housing technicians offshore for months in a floating hotel.

The offshore fabrication industry has gone through a radical transformation since its birth in the early 1970s, when the most pressing problem was to get oil into production rapidly.

Cost-plus contracts then gave fabricators a virtually open cheque-book, and the industry gained a reputation for consistently coming in with expensive cost overruns.

The advent of lump sum contracts in the late 1970s imposed a discipline to which some of the yards took years to respond.

Highlands Fabricators found itself nearly out of business in 1984 when Conoco's tension-leg platform for the Hutton field was taken out of the yard. There was no work because

with the unionised workforce refusing to accede to a 21-point plan to raise productivity. Hi-Fab could not bid competitively for a contract.

The yard wanted to eliminate a whole range of perks, including free transportation to work within a radius of 50 miles (which cost £2m a year) and subsidised meals. Workers were to shower on their own time and start clocking in at the workplace, instead of taking a long stroll from the yard's front gate on company time.

When work dried up in 1984, however, the union finally agreed. Significantly, agreement was reached to work flexibly, with welders and riggers, for example, switching off jobs.

Hi-Fab commissioned a study of its power consumption and slashed costs. New welding machines were installed that raised productivity three-

fold and reduced faulty welds to a negligible nine inches in a mile.

Hi-Fab built a giant covered workshop to enable it to move from its traditional strength of steel jackets to topsides fabrication.

Computer terminals were installed throughout the yard, enabling a record to be kept of each weld and each joint, and to allow more sophisticated monitoring and planning for completion of complex jobs.

Hi-Fab's adaptation to the changing market was, of course, not unique, but rather only what was necessary to stay alive in an industry that has matured rapidly.

The adaptation is just one part of a bigger story of why costs have come down so sharply throughout the North Sea oil industry. And it explains why work is continuing to come forward despite radically lower oil prices.



Conroy Petroleum and Natural Resources P.L.C.

Conroy Petroleum and Natural Resources P.L.C. is involved in mineral and hydrocarbon exploration in Ireland and overseas. The Company is presently carrying out feasibility studies on a major zinc lead discovery at Galmoy in Co. Kilkenny.

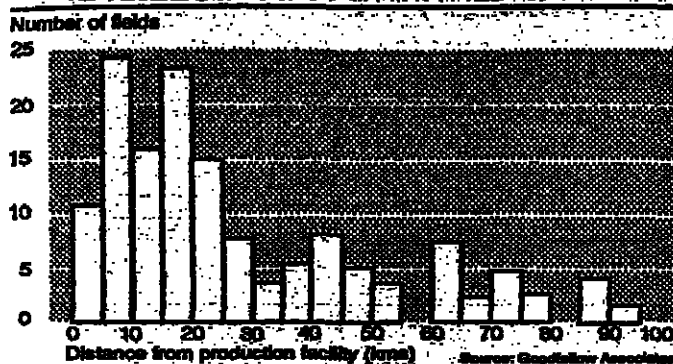
55, Dawson Street, Dublin 2, Ireland.

Tel: (01) 795833  
Fax: (01) 795836  
Telex: (500) 31818



## UK OIL INDUSTRY 5

## Undeveloped North Sea finds



THE FIRST generation of North Sea oil production developments relied on technology that was borrowed and adapted from the Gulf of Mexico.

True, the specifications for North Sea production platforms were more stringent because of the deeper and more turbulent water. And the North Sea has been the testing ground for a range of interesting innovations, such as Conoco's tension-leg platform at the Hutton field, in which a buoyant platform is fixed in position after being drawn down toward the water by steel legs fixed to the ocean floor. A traditional platform is supported above the

water by a steel or concrete structure. Still it is only now, as oil producers face the next phase of development, that engineers are working out a range of fast-track new production concepts that are forcing scientists to develop new machines. These developments are driven by the changing economics of future North Sea oil production. The big offshore oil fields, such as the Forties or the Brent, are almost certainly not to be found again. Medium-sized fields of between 100m and 500m barrels of recoverable oil are becoming much harder to find.

The next North Sea phase will require a technological leap

## Small fields set a challenge

Already the list of small fields under 100m barrels is growing. There are currently at least 80, and some estimates put the number at 185. These are likely to be the bread and butter of the oil industry in the next generation.

These fields are too small to justify paying for the construction of a big steel jacket with a traditional production platform. Already satellites, subsea development projects have become almost commonplace. In these arrangements, smaller fields close to existing platforms are developed by putting wellhead equipment on the ocean floor and piping the oil to a nearby platform for processing.

Advances in extended reach, or deviated, drilling also make it possible to reach remote fields that are several miles from a central platform.

In these cases, however, the technology is limited by reservoir pressures which place a restriction of perhaps 10 kilo-

metres on the distance between reservoirs and the main platforms. At greater distances pumps would have to be installed.

And it is here that the great challenge is being taken up - to design systems of machines that are reliable enough to be placed in sealed containers on the seabed for months of trouble-free operation. They must be built with enough cleverness so that they can be serviced easily on the seabed, by divers or remote operating vehicles, and then easily brought to the surface for more intense servicing occasionally.

Even if the basic machines were available, the task of linking them together and making them work as a system is daunting.

The means by which all of this will take place is swiftly coming into better focus as the result of an industry-wide effort. Some of the big oil companies - BP, Shell, Esso and Mobil - have their own

in-house research programmes. Seven oil companies have supported a similar project by Goodfellow Associates, which is building a prototype subsea production system for testing next year.

With aid coming from the oil companies and both the Offshore Supplies Office of the Department of Energy and the European Economic Commission, engineering companies are developing individual products to fit into the systems.

Two competing and complementary products are the key to the effort - multiphase subsea pumping and subsea separation. The multiphase pump, currently under development by the Weir Group, is aimed at pumping the mixture of water, oil and gas that comes out of the typical oil well.

In a commonly-used centrifugal pump, this is not possible because the action of the pump throws liquids away from the centre, leaving the mechanism to spin uselessly in a pocket of gas. A displacement pump, the sort used in low-volume "nodding donkey" oil wells onshore, could move the mixture, but not in the volumes required.

Weir has now successfully tested a prototype of the multiphase pump in the laboratory. The new pump is based on a rotating screw-type design, and is capable of propelling gas alone.

The task ahead for Weir is to come up with an acceptable packaging for use on the seabed. This requires simplification, and Weir hopes to make a solid metal casing that has no seals through which oil could potentially leak into the seawater. The pump could be run on a hydraulic turbine, driven by seawater, or by an electric-powered motor.

Weir must also decide what to do about sand which flows out with the oil because scouring of the internal pump parts could give it a short life.

The engineering difficulties are well illustrated by Weir's timetable for product development. Even though it now has the basic prototype in operation, it does not expect to test a multiphase pump on the seabed for another two to three years, and is fully aware that even then success for the product is far from certain.

An added difficulty for multiphase pumping is that, because water and gas are not separated from the mixture, the

pump and pipeline capacities must be quite large, adding significantly to the capital costs. Weir believes that because of these limitations, multiphase pumping is unlikely to prove economic at distances beyond about 40 kilometres (which none the less could cover about 75 per cent of North Sea discoveries).

Beyond these distances a different technology is likely - subsea separation. In a traditional production scheme, oil comes to a platform, propelled by pressure in the reservoir. Gas and water are then separated out. The water is cleaned of pollutants and discarded, while the gas is either flared or compressed, and exported through a dedicated pipeline or reinjected into the well.

Oil likewise will be pumped into a pipeline and brought to one of the main onshore terminals. The separation process, as opposed to multiphase pumping, is an established technology, and this is undoubtedly why development of the separation equipment for subsea operation is much further advanced.

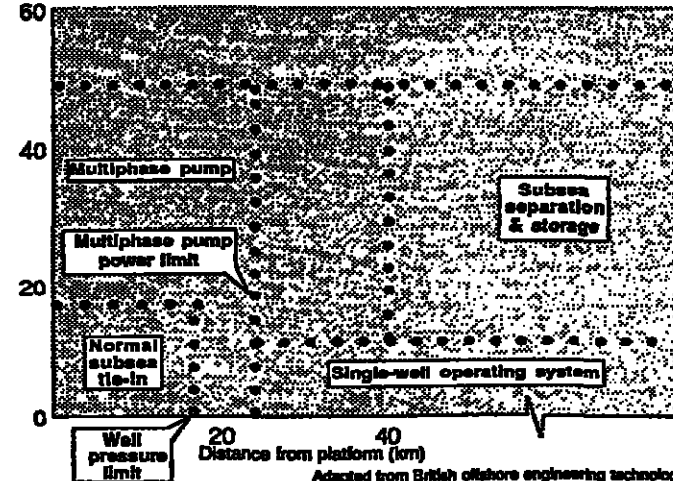
British Offshore Engineering Technology, a joint venture between Humphreys and Glasgow, the engineering and design group, and Strachan & Henshaw, the engineering company active in the nuclear field, has already built the first prototype subsea separator, which is currently being installed for trial operation at Hamilton Brothers' Argyll field.

Compared with multiphase pumping, subsea separation is a more complex process because each of the three products of separation - oil, gas and water - must be treated separately. Water must reach a high degree of purity before it can be released into the sea. Gas must be brought to the surface for flaring, exported to a nearby platform, or brought to the surface for reinjection into the reservoir in order to meet government restrictions on the flaring of gas.

Finally, the oil itself must be pumped somewhere, either before or after storage. BOET has worked out a grid that compares the situations appropriate to different systems of production (see illustration). The best approach to development is determined by the size of a field and its distance from existing production facilities.

## Small field development alternatives

Semi-submersible floating production facility or tanker conversion floating production facility  
Recoverable reserves (million barrels)



Adapted from British offshore engineering technology

According to the grid, subsea developments become attractive for reservoir sizes below 50m barrels, while above that size a floating production facility, such as that currently being developed by Amerada Hess for the Ivanhoe/Rob Roy fields, becomes economic.

Within the smaller reservoir range, the multiphase pump would be competitive at less than 25 kilometres. This is less than the limit which Weir believes may be competitive, and this will obviously be determined when the products are manufactured and available for testing.

When a small field is more than 25km from a platform, BOET believes, subsea separation is the logical alternative because of the relative ease of pumping separated products. But beyond a 40km limit, the case for remote, stand-alone subsea systems becomes attractive.

For smaller fields, below 30m barrels, gas would be flared and oil and water put into subsea storage pending visits by a shuttle tanker. Above 30m barrels, and the gas might be reinjected or exported after passing through a gas compressor on a permanently moored semi-submersible rig. This would be relatively cheap to operate and would not require substantial conversion work.

Another system yet may be appropriate to very small fields, say below 10m to 15m barrels of oil. In this case, BP is working on a system called SWOPS (single well oil production system), in which a single well head system would be installed, and visited periodically by a floating production

vessel. Oil would be drained off for a limited period, and the well would be revisited at a later date after well pressure had naturally built up again.

These are the concepts. But to sketch them out so quickly may give a misleading impression that the technology is near to being ready. It is not, and not only because of the development work still needed on the multiphase pump and the separator equipment. Goodfellow Associates says that some of the most critical technology will be the basics, the bits and pieces that hold together the more exotic machines.

These include subsea chokes, valves that regulate the flow of oil and take a high degree of battering. Connectors are needed to link up the parts of the system that have no valves that could be a source of leakage.

And a critical need that has so far defied the inventiveness of modern science is the underwater power point, a detachable high voltage connector that will not be subject to the corrosive effects of seawater. This is needed because of the impracticality of bringing equipment to the surface for occasional maintenance if permanently installed and sealed power lines must be brought up along with it.

There is perhaps no better illustration than this of the difficulties of working under the sea. The next phase of North Sea development work is coming ever more clearly into view. But a technological leap and a burst of inventiveness across the oil industry will still be needed to get there.

## After the Scottish whirlwind

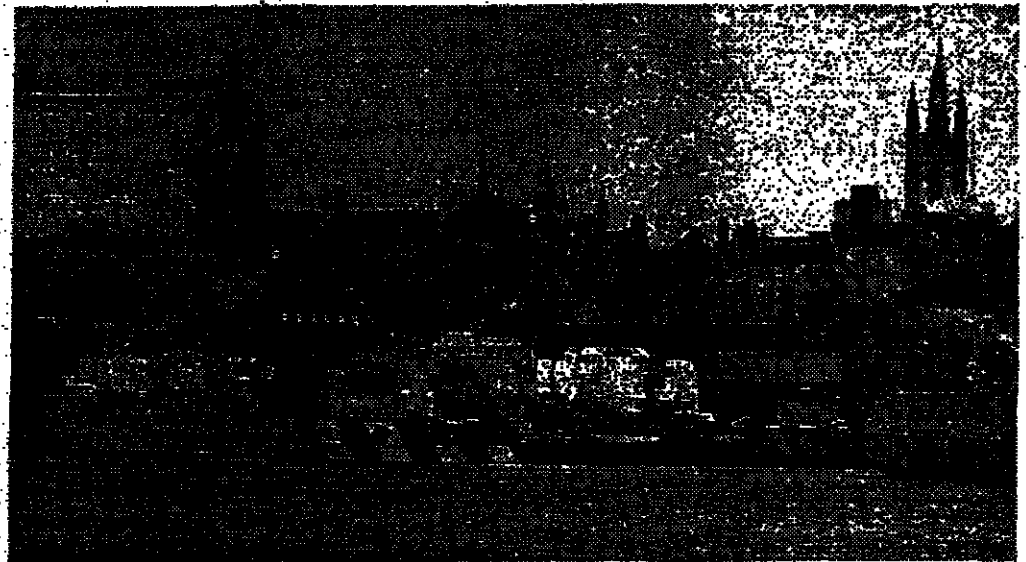
Continued from page 4

Lower Clyde. The bloom went off the Shetland economy, and the Moray Firth became known not for the oil platforms it supported but for the oil rigs lying idle there.

But the earliest signs of recovery showed in mid-1987, as exploration companies began to take advantage of the very low rates for chartering oil rigs. Direct oil industry employment in Scotland, the measure used by the Training Commission (which is usually considered very conservative in its definition of wholly oil-related work), bottomed out at 51,530 at the end of 1986, compared with a peak of 65,000 at the end of 1985. By December 1987 it had recovered to 53,500.

In Grampian region, centred on Aberdeen, which accounts for more than 80 per cent of such employment, the forecasters earlier this year predicted that employment would regain its 1985 peak in 1990, before declining again into the next century.

The slimness of supply industry is now more conscious of the need for efficiency, and for export opportunities. But while it is more confident of its ability to cope



Aberdeen: where the new horizon is the year 2000

pete, there is unlikely to be a return to the boom conditions of the pre-1986 era.

Such a reversion has given extra impetus to drives to ensure that the north-east of Scotland secures its future for the time when oil revenue declines seriously. Early in 1988, unconnected with the

gathering crisis in the oil industry, Mr Ian Wood, chairman and managing director of the John Wood Group, began to put together the working party that last year produced a detailed study called "Aberdeen Beyond 2000", which examines initiatives for improving and broadening the

city's economy. Aberdeen Beyond 2000 now has a small secretariat, and shortly before the Piper Alpha disaster it unveiled its scheme for a theme park in the city which would make the oil industry into an attraction for visitors, using simulators, models and film.

ENERGY FOR TOMORROW.  
THE CHALLENGE OF TODAY.

More than 12 years active participation in the development of the Northwest European Continental Shelf.  
Thistle • Deveron • Don • Beatrice • Ivanhoe • Rob Roy • Waverley • Balmoral • Glamis • Thames  
Veslefrikk • Snorre • Njord • Midgard • Snohvit • Statfjord East

**DEMINEX (NORGE) A/S**  
**DEMINEX UK OIL AND GAS LTD.**

Success through Know How and Resources



## It's quite an occasion for us.

Exactly 100 years ago we opened our first oil storage terminal, at Purfleet on the Thames.

Windjammers brought in kerosene in wooden barrels for lamp-oil - big business in 1888! That year we were also the first company to bring mineral oil to the UK, to lubricate engines.

Since then, we've made many improvements to lubricating oils. Esso research developed the first multi-grade motor oil and the first commercial synthetic lubricant for jet engines.

And we have manufactured and supplied medicinal white oils for advanced research into vaccine and scanning technology, which will save lives.

Today, in our Centenary Year we are celebrating the inauguration of our modernised Purfleet Lubricants

Plant, on its original site. It is one of the most advanced computer-controlled plants in Europe, using highly sophisticated information technology and robotics.

In full flow, we handle a million litres of oil a day. Blend 200 different oils to produce 300 different products for specialist industrial and medical use. Make up specialised oils to customers' own unique specifications. Continue to produce our leading range of motor oils under the Esso Superlube brand name, including our latest synthetic oil - Esso Superlube EX2.

And guarantee delivery to our customers on time, every time.

At Purfleet, we're in perfect shape to tackle our next 100 years in Britain. And that's formal.



Quality at work for Britain for 100 years.

A MEMBER OF THE ESSO GROUP





# You Can Hear The Whistle Blowin' Round The World.

If you think we're just a railroad, take another look.

We've become the world's first Global Transporter. And we've picked up a lot of new pieces along the way: our barge line, our gas

pipeline, our container ships, and more. They do more than just open up new areas for our company; they also make our railroad bigger, more efficient, and more profitable.

After all, what other railroad can

you name that has ports around the world?

Someday there will be other Global Transporters. Today there is only CSX. This is a company on the move.

**CSX**  
The Company  
That Puts Things  
In Motion.

Transportation/Energy/Properties/Technology



## ARTS

## A vision through Irish eyes

William Packer on the 21st anniversary of the Rosc exhibition

Rosc, which in 1967 means the "Poetry of Vision," this year celebrates the 21st anniversary of its inception. The prime mover was Michael Scott, the distinguished Irish architect, whose idea it was to bring to Ireland at regular intervals something of the best of contemporary art from around the world, to see it afresh through Irish eyes, and in the best Irish company. Rosc has been reappearing in Dublin more or less every four years, with one memorable diversion to Cork in the middle 1970s. This Rosc is the fifth, and, to judge by the healthy long list of sponsors, is by now set firm to continue as a significant feature in the calendar.

The practice has been to ask a special jury to nominate 50 or so artists to be invited to take part. This year the jurors were Kynaston McShine of the Museum of Modern Art of New York, Ollie Granath of the Moderna Museet of Stockholm, and Patrick Murphy, who succeeded Dr Scott as Chairman of Rosc. Their choice extends to 47 artists from 15 countries. The work is being shown on two sites - never ideal for an integral exhibition, but only two floors were available of the old Guinness Hop Store in Crane Street, which in 1984, newly converted, accommodated the entire show.

However, good has come of the difficulty for the magnificent Royal Hospital, half a mile away at Kilmansham, is an excellent substitute gallery,

ready made for the job, full of handsome, practical and adaptable spaces. Indeed, there is talk of its being used as a Museum of Modern Art. The place itself is worth the visit. Founded by Charles II, it lay for decades mouldering and unused. Only lately restored by the Government, it has yet to be assigned a permanent role. This demonstration of particular use could hardly have been better timed.

The building is set out around a quadrangle some 100 yards square, of which Rosc occupies three sides on the

have been to differ agreeably, to respect the judgment of others but to go one's own way. The sculpture is substantially non-figurative (Deacon, Toya, Anselmo) with some conceptual installation thrown in (Holzer, Leib, Horn, Fabro), and even the figurative (Gormley, Prendergast) has symbolic or conceptual overtones.

Some threads do come together by coincidence - or are they really straws in the wind? The sculpture is substantially non-figurative (Deacon, Toya, Anselmo) with some conceptual installation thrown in (Holzer, Leib, Horn, Fabro), and even the figurative (Gormley, Prendergast) has symbolic or conceptual overtones.

**The jury agreement seems to have been to differ agreeably, to respect the judgment of others but to go one's own way**

first floor. A gallery runs round the inside, wide enough to give room to the largest paintings, onto which gives a succession of interconnecting, ample, well-lit and high-ceilinged rooms. Two of these three sides are given to the Rosc proper, carried over from the Hop Store, with paintings hung along the open gallery. The other side, the Royal Hospital, contains sculptural installations in the rooms. The third side holds Rosc in its occasional historical aspect, which consists this time of a selection from the Costakis Collection of Russian Revolutionary Art.

Any jury will confer its peculiar character onto the exhibition it chooses. With this Rosc the agreement would seem to

once by their absence, and it would be a mistake to look for any clear theory or programme in the selection. The only common rule, perhaps, was a decision to look no further than to artists in mid career, for even the more established or lately successful artists, such as the sculptors Richard Deacon, Anthony Gormley, Giovanni Anselmo and Rebecca Horn, or painters Eric Marder, Christopher Le Brun, Robert Combas, Jose Sicilia and John Charles Blais, are hardly yet in their dotage.

For the rest, old, young or middle aged, the artists are those who are over-due comparative international exposure, such as Tony O'Malley, Basil Blackshaw and Mary

Fitzgerald of Ireland, Ollie Kaks of Sweden, Shigeo Toyoda of Japan - whose car posts and stockpiles are shown to such advantage in Venice this summer - and the Australian expressionists, David Allen and Keith Looby. Or - like the young Irish sculptor, Kathy Prendergast, with her wobbly, mystical bronze boats and tiny coracles - the artists are simply worthy the encouragement of a lucky break.

The painting is for the most part expressionist (Allen, Winters, le Brun, Blais, Bourke, Jenny). There is a significant proportion of abstraction (Sicilia, McKeever, Marder), some of it hard-edged and constructivist (Tansey, and the Cecil King memorial display), and much painting that, if not abstract exactly, is radically abstracted (Basquiat - who died last week - Looby, Kaks, Sevilla, O'Malley). And there is figurative work, either graphic or photographic, (Parr, Wall) that carries a clear social comment. In particular, there is Tim Rollins and his Kids of Survival



Australian artist David Allen with "Self-portrait at Car, 1988," oil on canvas

from the Bronx, with their poster-like image of Charles Hapgood as a sort of dog, one of a set of leaders portrayed as symbolical beasts.

The George Costakis exhibition necessarily covers much of the same ground as the Russian Show now at the Thyssen Collection in Lugano, which I reviewed two weeks ago. There is little point in repeating myself, especially as a similar selection was shown at the Royal Academy some years ago. But Costakis, a Greek

expatriate who spent his working life in Russia, was able to rescue an enormous amount of material in the time before the Russians themselves would acknowledge the critical value of the work of the Russian avant garde in the first three decades of this century. That so much survives at all is infinitely to Costakis' credit. This show is a splendid concise survey of the period and is thoroughly to be recommended.

Rosc continues daily at both venues until October 15.

## Lutoslawski Piano Concerto

SALZBURG FESTIVAL

The concert that Lutoslawski gave at the Proms last week has now reached Salzburg - but with one important addition. As the major item, the audience at the Kleines Festspielhaus had the first performance of a newly composed Piano Concerto, which was commissioned by the Salzburg Festival and marks the composer's late entry into this particular field at the age of 75.

For all that, you could easily believe that his most recent works are a young man's music: there is an energy, a quickness of thought, an immediate sensitivity to the touch, that keeps the scores tingling with life. The more time passes, the more Lutoslawski seems to fill his music with ideas, as though there is much to be said and ever less time in which to say it.

At this point, one might well say that Lutoslawski should call the piece *Chain 4* and have

done with it. But with the arrival of the third section (the concerto is in a single movement) the piano soloist embarks on a cadenza-like recitative which announces, as surely as if it had words, that the work is about to take a decisive change of direction.

First, this leads to a sort of romantic slow movement which has rhetorical flourishes borrowed from Rachmaninov; and then, with more conviction, to a finale of genuine power, which raises the musical dialectic to an altogether higher level. This is in the form of a rough and energetic chaconne for the orchestra to which the piano returns with dramatic counter-arguments - a strict academic strait-jacket that is perhaps unexpected from Lutoslawski, with his current preoccupations in fluidity of form, but one to which he brings a sense of racing excitement.

The finale settles one other question, too. This is a real concerto after all, and it was played as one by Krystian Zimerman, who brought what seems to be a fine performance with the ORF Symphony Orchestra to an impassioned and resoundingly heroic end. Despite enthusiastic applause, Lutoslawski modestly declined Zimerman's gentle encouragement to take a solo bow at the end. Perhaps he could be persuaded by a Proms audience next year.

Richard Fairman

## Music in the Queen's Hall

EDINBURGH FESTIVAL

For whatever reason, the Festival's orchestral concerts in the Usher Hall continue to draw audiences that would have looked dismayingly thin in Lord Haweswood's time. Perhaps Edinburgh is now too well supplied with symphonic music during the winter, or perhaps the orchestral fare no longer exerts a special appeal for visitors from elsewhere. At any rate, there is an enormous contrast with the packed morning concerts in the Queen's Hall, which was called into play more recently as a venue for chamber music and solo recitals, and is ideal for the purpose.

There, one of this year's great successes continues: the Shostakovich Quartet's survey of their eponymous composer's 15 string quartets. They are a relatively young team (their first public appearance came between the composition of the eleventh and twelfth quartets of the cycle, in 1957), but an expert and marvellously well-balanced one. Adopting a composer's name does not of course guarantee unique authority - admirable though the Beethoven, Bartók and Alban Berg quartets are - but at least a token of loyal ambitions; and in fact these players expound Shostakovich with luminous sympathy.

The programme I heard on Saturday consisted of the Quartets Nos. 6, 7 and 8, which by happenstance make a particularly satisfying sequence in the first two delicate and intimate in different moods, the next - the famous C minor elegy for Dresden - severely powerful. The wealth of precise

expressive detail in each performance was complemented by flawless overall shaping, so that even the catalogue of anguished self-quotations in the Eighth seemed a rigorous structure. It is no exaggeration to say that this cycle is proving revolutionary; astonishing to learn that these players have never yet delivered it complete in the Soviet Union!

On the previous morning the American soprano Barbara Hendricks offered a pretty recital which ran from Haydn to Mahler. Haydn's little English songs suited her well, appealing style perfectly - indeed, few professional singers nowadays could be so faithful to their miniature scale - and Mozart too. Her interesting pianist, Roland Puntinen, was less smooth and suave in Mendelssohn's accompaniments than the Italian required, but in Hugo Wolf his imaginative touches added much to Miss Hendricks' innocently sincere treatment. The limits of her fragile range were uncomfortable in Mahler, especially with his heartier songs: "Rheinlegendchen" emerged as little more than dry recitation. Maximum contrast: the legendary Brecht performer Ekkehard Schall, who can barely sing at all, has been doing late-night shows in the King's Theatre. Scathing attack, abusive diction, scabrous wit - the exceedingly English translations of the poems and songs in the programme book willed in the face of this superbly truculent peasant to male chauvinism, class war and the Party.

David Murray

## Adam Faith in new West End musical

Adam Faith and Anita Dobson are to co-star in a new musical, *Budgie*, opening in London at the Cambridge Theatre on October 15 with previews from October 4. The director is Jonathan Lynn.

## A moving triumph over adversity

There must be a moral in the respective sites of London and Paris's major movie shrines. The Cinematheque Francaise, housing the enchanting Langlois museum, sits atop a broad flight of steps and overlooks the grand vista of a Paris park. London's National Film Theatre, to be joined at the hip next month by the long-awaited Museum of the Moving Image, squats under Waterloo Bridge and fends off sonic assault from juggernauts passing overhead.

Where the French, in honouring art, love transcendent style, the British prefer heroic adversity. The site of the NFT and the new museum, (reviewed from an architectural viewpoint by my colleague Colin Amery in Monday's FT) is to put it gently, insane. But never mind. The racket of traffic is somehow kept out, and my advance tour suggests that people will be too enthralled by the museum's contents to notice it anyway.

Snaking through the three-level themed tour of moving-image history, from zoetropes to holograms, from Lumiere to Lucas, you are in a world combining Disneyland and the Science Museum. Many of the exhibits and information aids were still missing on my visit, but there is already a sense of enchantment hand-in-hand with scholarship. As my predecessor on this newspaper, David Robinson, who helped organise the museum, rightly argues in the souvenir brochure, "MOMI must inform but it must also generate curiosity... It must be fun."

On instruction, the jury must remain out until after the museum's official opening on September 15. Most of the text and information panels are not yet in place. But ample wall-space has been cleared for

them, and visitors who remain foggy about the difference between a praxinoscope and a phenakistoscope, or between Theda Bara and Pola Negri, will be able to ask one of the eight actor-guides who will be posted through the museum, impersonating everything from film directors to ushers.

The fun, though, or most of it, is already in place. There is a phantasmagoria theatre, in which visitors peer at the screen over the heads of a startlingly realistic Victorian audience in papier-mache. There is a Temple to the Gods in mock marble, whose Parthenon-style roof is held up by movie-star Cary Grant (Pictorial, Valentino, Pickford and Co.). There is an agit-train, whose multi-coloured exterior and movie-house interior mimics the Soviet film trains that used to pound through post-revolution Russia. And there is a life-size Odessa facade and foyer, celebrating the immortal excesses of Art Deco.

Different exhibition areas spotlight aspects of cinema history. Rooms, alcoves or corridors are devoted to German Expressionism, Sound Effects, Avant Garde/Surrealism, Documentary, Animation and dozens more topics. At the heart of the maze of rooms on the main level is a mock sound stage, sporting a real movie crane - the one Alfred Hitchcock brought over from the US to make *Under Capricorn* - and with booths round its sides. Here visitors can try out different technical crafts: make-up, special effects, cinematography, editing, even scriptwriting.

The final part of the tour is the top-floor television area. This seems the fullest part of the museum. Television may be a less showy medium than cinema, but one still suspects that more could have been



A statue of Theda Bara is one of the supports of the museum's "Temple to the Gods"

done. A series of row of quaint old post-war TV sets, pushing out pre-colour images, does not quite make the pulse race. And the mock 10 Downing Street facade, with a front-door open to reveal five TV monitors all each other, each alive with the image of a recent PM, sounds like an invitation to run in terror from the museum.

However, I did like Nam June Pak's globe-headed robot sculpture, bursting with images from the monitor-housings all over his body. And I liked the "typical British family" (Mr and Mrs Papier-mache with dog and daughter) eating their baked beans, egg and chips in front of the telly, only to be startled rigid when a rear-wall curtain parts to reveal a Cinemascope screen alive with *The Robe*.

Wide screens were cinema's answer to the 1950s threat from the cathode-ray tube. Since

then each medium has constantly attempted to outdo the other, finding new audio-visual or communicational values with which to outpace its rival. In the process, television has found the larger audience, but movies have found the larger mythology.

There is an enchanting Olympianism - gaudy, foolish, irresistible - about cinema's idea of its own importance, to which MOMI's Temple to the Gods is a perfect tribute. The museum recognises, and for the most part celebrates, the fact that make-believe and grandiloquence are much of what people love about moving pictures. When this sense of fun and spectacle is joined by the promised largesse of information, the Museum of the Moving Image should be a place to cherish.

Nigel Andrews

## I Capuleti ed i Montecchi

ALBERT HALL

The Prommers did not flock to Sunday's concert performance of Bellini's opera, given by the BBC Symphony Orchestra and Singers under John Pritchard. This was their misjudgment, and their loss, for though in advance it might have been feared that Bellini's Romeo and Juliet opera, so pitifully dramatic, would not be comfortably accommodated in concert circumstances, the suitability of the Albert Hall to bel canto opera was demonstrated soon enough. The melodic lines - instrumental no less than vocal - reached across the spaces to seize the audience's attention; there was no gap between the performers' artistry and the listeners' involvement. Many a Bellini production has seemed less inherently dramatic in effect.

For the excellent sense of style which guided the whole performance was not the conductor to thank, more than any other single participant. Indeed, there is no other living conductor I would rather hear in early-Ottocento Italian opera. Pritchard's control of mood, span, and timing in Bellini has been praised whenever he has conducted *Norma* at Covent Garden; here in the young Bellini's first full demonstration of operatic mastery, the same virtues combined to assert the unmistakable originality of Bellini's dramatic ground-plan.

Insensitively handled or else too fiercely driven, the work sounds uneven, full of commonplace formula and comparatively deprived of the long melodies that were later to be this composer's trademark. Under Pritchard's firm yet eloquently supple direction all the right notes were made, but without the least heaviness or insistence. The beautifully limpid, singing quality of the

orchestral playing was the performance's secure basis; there should be words of praise for at least three of the instrumentalists - Derek Taylor (horn), Timothy Hugh (cello), Colin Bradbury (clarinet) - quite as warm as for any of the singers.

The leading roles were later, easily and successfully assigned to two singers better known on the continent than in Britain (perhaps this is what kept away the canny-fancier crowds). The American soprano Lella Cuberli (Juliet), whom previously I've admired in Rossini's *Tamara* in Venice, is complete mistress of Bellini's cantilena. Her tone, tenderly glowing yet capable of vigorous brightness, is malleable, and she has the gift - essential in this particular operatic genre, yet so often neglected - of floating a line, careening above it, without at the same time giving in to mannerisms or swooniness. The French mezzo Martine Dupuy (Romeo) is a distinctive singer with an exciting, not conventionally beautiful instrument; she was less smooth and subtle than her partner, but impressively so. The mixture of female voices and temperaments was just as it should be; the two played together with touching skill and sympathy. The men were on a different, and somewhat lower, plane. Keith Lewis as the priest Elfraso, a bit of both, it is a multi-faceted work in which I find unsuited to Italian opera, and two rather heavy basses - Eric Halfonson and Roderick Kennedy - as Capulet *père* and Friar Laurence. But the minor quibbles that they occasioned were unimportant: this opera is the principal show, and the conductor's, and thus was here a notable success.

Max Loppert

## ARTS GUIDE

August 19-25

## MUSIC

**London**  
New York Philharmonic Orchestra, conducted by Zubin Mehta, Beethoven, Elton John, and Stravinsky. Henry Wood Promenade Concert series, Royal Albert Hall, Kensington Gore (Tue), (889 8212).  
BBC Symphony Orchestra, conducted by David Atherton with Lucie Fene (soprano) and Thomas Allen (baritone). Britten and Mahler. Royal Albert Hall (Wed).  
BBC Philharmonic Orchestra, conducted by Edward Downes, with Ed Haendel (violin). Mendelssohn, Alexander Goehr and Beethoven. Royal Albert Hall (Thurs).

**Paris**  
Quatuor Parisis, with Philippe Cassard (piano), Roussel, Faure, Beethoven and Chopin. Les Violons du Louvre, with Alice Ador (piano), Olivier Messiaen's Les Violons du Louvre. Auditorium des Halles (Wed 8.30 pm).  
Australian Youth Orchestra, conducted by Christoph Eschenbach, with Taimon Barto (piano). Graeco Koene, Bachmanoff, Messiaen, Ravel, Radio France, Grand Auditorium (Thurs 8.30 pm).

## New York

Mostly Mozart Festival. Mostly Mozart Festival Orchestra, Gerard Schwarz conducting, with the Mostly Mozart Festival Chorus directed by Joseph Flummerfelt. All-Haydn programme (Tue, Wed). Beaux Arts Trio, with a programme of Mozart, Mendelssohn (Thurs). Avery Fisher Hall, Lincoln Center (874 2424).

## Washington

Wolf Trap Festival. Pop concerts this week include Kenny Loggins (Tue); Roy Orbison and Carl Perkins (Wed); and Gordon Lightfoot (Thurs), (422 0200).

## Tokyo

Yomuri Nippon Symphony Orchestra Summer Festival. Opera Concert (Verdi, La Traviata etc.) (Wed); Concerto (Mendelssohn, Dvorak, Tchaikovsky) (Thurs). Suntory Hall (270 6151).

## London Philharmonic

ALBERT HALL

The London Philharmonic has completed its summer tour of duty at Glyndebourne, and its first concert at the Proms this year had a genuine feeling of celebration. It is rare for one of the London orchestras to appear at the Albert Hall and play with the vividness that suggests something more than routine. But the LPO on Saturday's form gave the impression of being a distinguished visitor, eager to display itself in the finest possible light before a capacity house.

Andrew Litton was the conductor for the evening, and Salvatore Accardo the soloist in the Mendelssohn Violin Concerto. The concerto proved to be the least distinguished element of the programme - Accardo's customary poise and polish temporarily deserted him and the performance consequently remained thoroughly earthbound. Litton had led off much more positively with Chalkovsky's *Romeo and Juliet* Overture, to which the incisive edge to the wind solos and crisp string chording lent genuine dramatic pace. An ideal account would have depended upon a more luxurious sound; the LPO fell short only in the richness of its playing, and not at all in its commitment. Shostakovich's Tenth Symphony provided a taste of more

severity altogether, not least for the conductor. Whatever the programme's background to the symphony, whether it was intended as a piece of autobiography or, as *Testimony* suggested, as a portrait of Stalin or even (perhaps more likely) a bit of both, it is a multi-faceted work in which the arching structures set great demands of concentration on interpreters. Downright bad performances of the Tenth are rare, outstanding ones rarer still.

Litton elected to play down its tragic aspects - even the scherzo, immaculately played by the LPO, was less the standard torrential assault than a lithe demonstration of orchestral virtuosity, and the focus of the slow movement was directed towards its rapt interlocking of paragraphs in which the wind playing was outstanding. He had found particular resonances in the coda to the first movement, drawing out its lingering strands and isolated chords with great care to suggest that he has the elements of a great interpretation of the work within his reach. Litton's knack of requiring an orchestra to give consistently of its best is already proved beyond doubt.

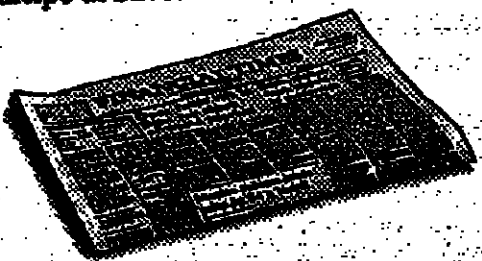
Andrew Clements

## Travelling on Business in Italy?

Enjoy reading your complimentary copy of the Financial Times when you're staying...

... in Milano at the:

Diana Majestic, Duca di Milano, Hotel Excelsior Gallia, Hilton Hotel, Hotel Michelangelo, Hotel Palace, Hotel Principe di Savoia



FINANCIAL TIMES  
Europe's Business Newspaper



## FINANCIAL TIMES

BRACKEN HOUSE, CANNON STREET, LONDON EC4A 4BY  
 Telegrams: Finantimo, London FS4. Telex: 8954871  
 Telephone: 01-248 8000

Tuesday August 23 1988

## Mr Botha's dilemma

SOUTH AFRICAN politics presented an incongruous spectacle last week. President P.W. Botha offered Nelson Mandela his good wishes for a speedy recovery, hinted that his release might be in sight, but went on to reaffirm his commitment to the system the African National Congress leader is determined to overthrow.

Mr Botha is in a predicament. He is caught between growing demands for the release of Mr Mandela, whose health arouses concern, and the impact this would have on the ruling National Party, which is seeking to retain the loyalty of the white electorate in the face of a challenge from the far right.

He would like Mr Mandela to help him out by renouncing violence in return for liberty. No one expects Mr Mandela to do this, leaving Mr Botha in the awkward position of having to choose between the narrow electoral interest of his party (some of whose members are urging the President to defy the extreme right), and the wider interests of his country.

The ANC leader, who has tuberculosis, was removed from Pollsmoor prison in Cape Town to hospital for treatment. There is no reason to think that he will not recover. The episode should none the less concentrate the President's mind on the consequences of South Africa's leading black politician, who turned 70 last month, dying in jail.

It would almost certainly lead to demonstrations and strikes on a scale unprecedented even by South Africa's standards. It would fuel the campaign for an intensification of international sanctions. Most important of all, South Africa will have lost the chance to open negotiations for a democratic society with a man who may be able to transcend the divisions in black politics.

It adds up to a compelling case for Mr Mandela's release. From Mr Botha's perspective, however, the terms Mr Mandela has set for his release must seem difficult to accept. Mr Botha told a National Party congress in Durban last week that he hoped Mr Mandela would make it possible for him to act in a "humane way" implying that if the ANC leader renounced violence his release would follow — an

offer first made in 1986.

On that earlier occasion Mr Mandela said that he would accept freedom only if it was offered without conditions. There is no indication that he has changed his mind while on his sick-bed. He will only disavow violence if the Government lifts the ban on the ANC and other political parties, and begins negotiations for full political rights to South Africa's 26 million black majority.

The very speech in which Mr Botha hinted at the possibility of Mr Mandela's release showed how wide the gulf is between the two men. Set aside his categorical statement that he was "not considering even to discuss the possibility of black majority rule," for it may well be that South Africa will not follow the constitutional pattern of other African states. Fundamental changes, including the dismantling of apartheid, are nevertheless inevitable. Yet Mr Botha took the opportunity to underline his commitment to the Group Areas Act, expressing his determination to press ahead with changes to the Act which would consolidate one of the pillars of segregation.

## Extremist challenge

Clearly Mr Botha was attempting to head off the challenge to the ruling National Party posed by the extreme right-wing Conservative Party, already confident of making gains at municipal elections on October 26. Yet whatever success Mr Botha has on this front will be at the expense of efforts to come to terms with black aspirations.

As long as Mr Mandela is in jail — or under armed guard in a hospital, or in a sanatorium — Mr Botha's attempt to initiate constitutional change are stymied. Every black leader of stature and credibility, including Chief Mangosuthu Buthe, who is outspoken in his opposition to economic sanctions and disinvestment by foreign companies, have made Mr Mandela's release a condition of their participation in the Government's proposed National Consultative Council.

It may be that Mr Botha is looking for a middle way: release Mr Mandela without conditions, but use the state's draconian emergency powers to curb his activities. This falls far short of what is needed — round table talks on a new constitution. But at least might bring South Africa a little closer to that objective.

## New target for UK takeovers

IN THE LAST few months a growing number of British companies have been announcing takeovers or joint ventures on the Continent. Often involving medium-sized and smaller companies, most of the deals are explicitly designed to create stronger market positions in advance of the removal of the European Community's internal barriers in 1992.

It is too early to conclude that takeover activity is shifting from the US to Europe: the largest British companies seem far more preoccupied with North America. But the increasing interest in Continental purchases is reminiscent of the wave of takeover activity that took place in the early 1970s, just before and after the UK's entry into the EC. The important question is whether the mistakes which were made at that time can be avoided.

## Neglected market

In the earlier period many British companies were faced with the need to reorientate themselves rapidly to the needs of a market which had traditionally been neglected in favour of the Commonwealth, other developing countries and to some extent North America. There was a rush to establish bridgeheads on the Continent and a tendency to underestimate the very different commercial and legal environment which prevailed in much of the Community.

More fundamental was the failure to appreciate that the key to success in the enlarged European market lay in the competitiveness of the products and services which the British company had to offer, and that deficiencies in this respect could not be corrected simply by making acquisitions on the Continent.

Disillusionment with Europe, combined with poor economic prospects after the 1973 oil crisis, stimulated a surge of British takeover activity in the US in the second half of the 1970s and in the 1980s. Here, too, despite the common

language and a similar financial system, some serious mistakes were made. The task of managing and integrating US acquisitions, especially the big ones, proved difficult. In the US, as in Europe, too many companies did not analyse with sufficient rigour what additional strengths — new products, manufacturing know-how or marketing skills — they would bring to the US company and thus improve its performance.

## Fewer barriers

It is arguable that one of the advantages of the 1992 programme should be to reduce the need for cross-border acquisitions. With fewer barriers separating one national market from another, it should in principle be easier for a manufacturer, operating efficiently from one site, to supply the whole of the European market. As long as distribution arrangements are adequate, a network of local manufacturing operations, which in any case poses management problems of its own, may no longer be appropriate. The crucial point is that in any acquisition or joint venture there should be genuine economies of scale or other synergies which enhance the competitiveness of the combined group.

As the 1992 programme gathers pace, some of the institutional obstacles to cross-frontier mergers should be reduced and this will be all to the good. There is still too ready an assumption among British businessmen that the Continent is an alien world. Incursions by European companies into the UK may gradually change this attitude, but it would be wrong for British companies to react by rushing into ill-considered takeovers of their own.

Preparing for 1992 may require changes in product design, in manufacturing methods and in marketing. Takeovers are only one possible element in the strategy, and not necessarily the most productive.

Kevin Brown reports on a battle for international mail that pits private sector against public

## A postal challenge delivered

The British Post Office has a powerful defender in Mrs Margaret Thatcher, who has publicly declared her emotional attachment to the Royal Mail and her determination to exclude it from the wave of privatisations sweeping the UK's state-owned industries. However, even the Prime Minister is unlikely to be able to protect the Post Office from a growing threat to its international business from aggressive private sector competitors.

This is partly because the future of international mail is out of the hands of individual governments: the important decisions will be taken by the European Commission, in Brussels, and the Universal Postal Union, in Washington. It is also because a number of private companies have shown they are determined to provide a competitive service and are prepared to invest huge sums to expand their market share.

Their determination was illustrated last month when the International Express Carriers Conference, which represents the eight biggest private companies, made a formal complaint to the Commission accusing seven European post offices of trying to put its members out of business by rigging prices.

In 18 years, the private mail companies have built a \$16bn global business

The complaint came as a shock to the postal administrations, which did not expect to face a legal challenge as well as a commercial one. The move is significant as a signal from the private sector that its backstage campaign for fundamental reform is entering a new phase — one of confrontation.

The stakes are high. What was once an international public sector monopoly has changed rapidly since Adrian Dalseg, Larry Ehlstrom and Robert Lynn set up DHL, the first private air courier service, in San Francisco 18 years ago. Since then, the private companies have built a global business worth more than \$16bn (£9.34bn) a year, including domestic revenue of about \$8bn in the US, the biggest single market. The aim of the private companies is to establish an international regime for postal services which would allow free competition between public and private sectors

throughout the world. They believe their entrepreneurial skills, combined with experience gained in the domestic markets of north America, Australia and Europe, would allow them to cream off a lucrative share of the most profitable business. According to Mr Gordon Barton, chairman of the IECC, the international postal industry is on the verge of a shake-up which will be as significant as the introduction of penny post in Britain in 1840.

The postal administrations have not taken private sector competition lying down. Most have established or strengthened their own express services, such as the UK's Data Post subsidiary. Twelve north American and European post offices have established a joint distribution hub in Brussels designed to help them compete with the independent networks.

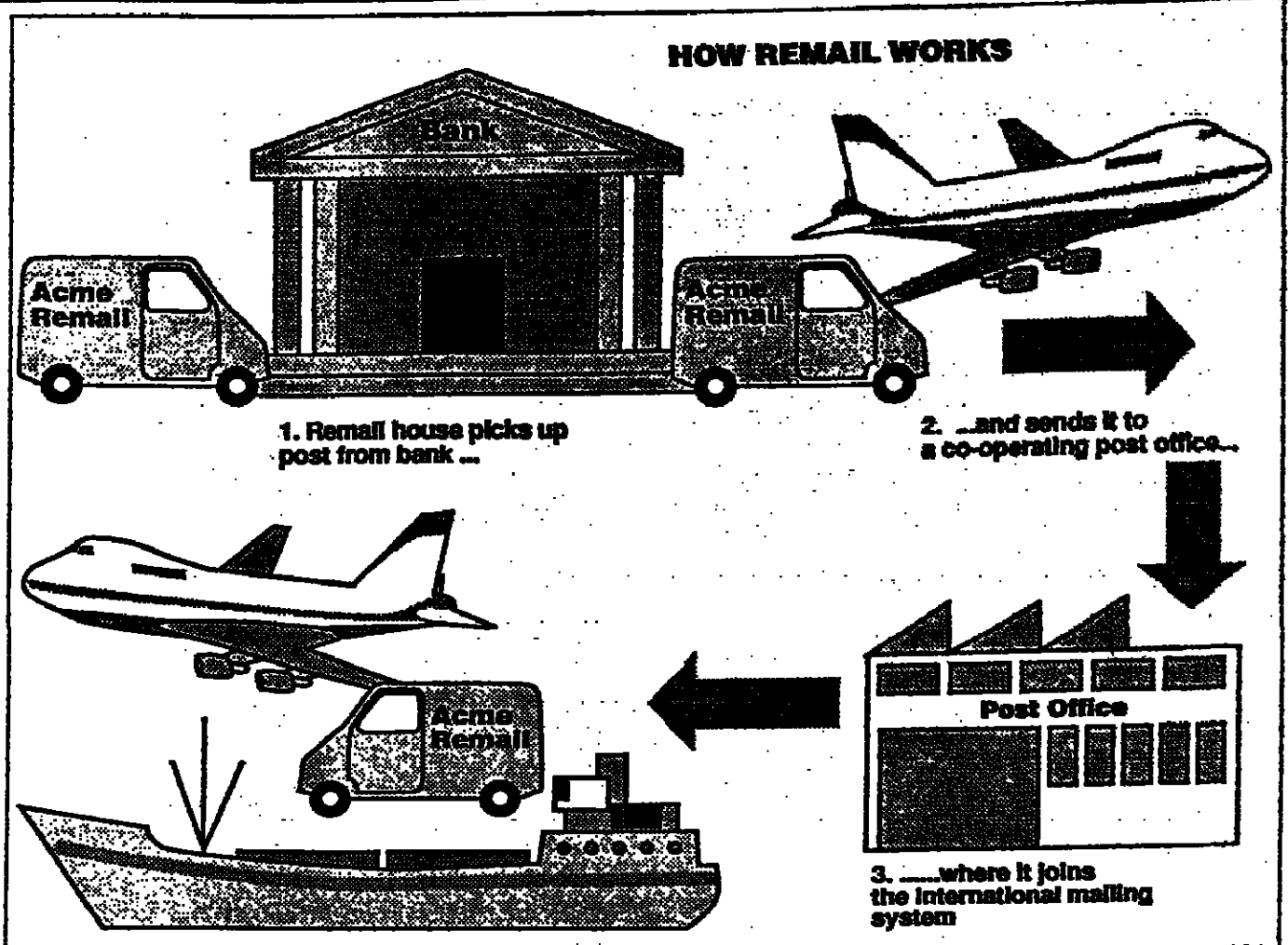
The main focus of the current dispute is called "remail", an extension of the activities of the express companies, that has been developed over the last couple of years. The new business is particularly controversial because it requires direct co-operation between private operators and "progressive" post offices to take business from more conservative administrations.

Remail involves the collection of business mail by private companies, which transport it to one of a number of co-operating post offices in Europe and elsewhere.

The mail then goes into the international postal system for onward delivery, in some cases being mailed back to the country of origin. In effect, this puts national post offices in competition with each other for international business.

The service is used principally by large commercial companies making regular shipments of documents such as bank statements, prospectuses, corporate reports and mail shots. The remailers say they are able to undercut established rates because their integrated transport systems are more efficient than the less sophisticated systems used by the post offices, which have tended to rely on buying belly space from the commercial airlines. Most of the companies use the hub and spokes distribution system developed in the US by Federal Express, under which all mail is consolidated at a central location before being distributed.

The biggest European flow of remail is from customers in the UK, where the whole market for private-sector postal ser-



vices is more developed than elsewhere, through the remail houses, to post offices in the Netherlands, Belgium, Denmark and Luxembourg. The size of the market is almost impossible to quantify, since none of the companies involved publish figures.

However, Mr Paul Moorhouse, general manager of TNT Mailfast, the biggest remail company, estimates the European market at about 90 tons of mail a week, with annual revenue in the region of £50m. More important, he estimates the growth rate at up to 100 per cent a year.

Now the post offices are being accused by the IECC of resorting to dirty tricks to force the remailers out of business. The IECC's complaint to the Commission accuses the post offices of the UK, Belgium, Finland, France, the Netherlands, Sweden and Switzerland of conspiring to breach the Treaty of Rome by an illegal adjustment of their price structures for international mail — known as terminal dues — to penalise the private carriers.

Terminal dues came into existence as the arrangement under which national post offices compensate each other for handling international mail. The dues are agreed bilaterally between national administrations, which means they are paid only where there is an imbalance of mail. The dues are also, however, the way co-operating post offices charge the remail houses for handling their letters. Since remail houses do not perform compensating services for the post offices they use, however, they are always in imbalance. So terminal dues are charged on all remail — making the business particularly vulnerable to any change that pushes up the cost of the dues. That is exactly what the postal authorities' adjustment of terminal dues has brought about. The IECC calculates that the new agreement would increase the

cost of sending a 20 g letter by remail from 4p to 11p. The principal villain identified in the IECC complaint is the UK Post Office, which wrote to its European counterparts in April last year calling a meeting in London to respond to the challenge from remail. Part of the letter, quoted in the complaint, reads: "Remailing poses a serious threat to the future relationships of postal administrations. Airmail letter traffic, the traditional preserve of postal administrations, is now being strongly attacked by large multinational companies... It is vital to consider whether there is a common policy we can adopt to counter the activity of these companies."

It was this meeting which led to the agreement to revise terminal dues. Oddly, the signers of the agreement include several of the post offices which have benefited most from co-operating with the remailers. The IECC complaint says these post offices "appear to have been induced to subscribe to an agreement contrary to their own best interests by threats of retaliation."

The post offices say the revision of terminal dues is a move towards a system based on the actual cost of handling foreign mail, rather than administrative convenience, and should therefore be welcomed by the private companies. This is rejected by the IECC, which says costs vary from one EC post office to another by a factor of three or more. It says it is no more reasonable to use average costs to set terminal dues than it would be to use average airline fares to justify a single non-competitive air fare within the European Community.

The most important point about the terminal dues agreement is that it appears to be an attempt to protect post offices from competing with each other for remail business. This is at the heart of the private companies' complaint that the

international postal system is out of line with modern commercial practice.

Mr James Campbell, the Washington-based secretary of the IECC, says that post offices are competing with each other as "a matter of operational reality, not ideology." He adds: "There is no economic reason why all international mail must be handled by the local post office. Different national post offices can feasibly compete as regional collection and distribution hubs. Compared to the traditional patchwork of local monopolies, regional hubs for international mailings offer benefits of economies of scale and improved end-to-end service."

The objective of the IECC's complaint to the Commission is both to secure an important bridgehead for liberalisation in Europe and to put pressure for more widespread change on the Universal Postal Union, the international regulatory body for postal services, which is to hold a rules revision conference in Washington next year.

There are indications that some Western governments do accept the need for change. Most notable is the attitude of the US Department of Commerce, which has said the terminal dues revision would "perpetuate an anachronistic system that is fundamentally at odds with free market economic principles." The US is expected to put this view forcefully at a meeting of post office directors in Washington next month.

There are also signs of flexibility among the European post offices. Mr Cedric Briscoe, general manager of the UK's international letter services and chairman of the Posts Commission of the European Community of Postal and Telecommunications Administrations, a semi-autonomous grouping of European ITU members, says there is a growing acceptance that a regulatory review is necessary.

Mr Briscoe says the terminal dues agreement is the first step towards the establishment of a fully cost-based system for handling international mail, which the European post offices hope to propose to the UPU revision conference next year. It is unlikely, however, that Third World countries, which have a majority of votes in the UPU, will agree to such a radical step in the near future.

It is also unlikely that the European post offices themselves would accept moves towards a fully deregulated environment, even within the EC. Mr Briscoe concedes that private competition has stimulated a competitive response

The principal villain identified in the mail companies' complaint is the UK Post Office

from the postal establishment, but insists that a fully deregulated system would lead to anarchy, not opportunity.

On the other hand, officials say privately that the profitable UK Post Office is so much more efficient than its counterparts in mainland Europe that it could prosper in a deregulated environment by operating as a huge regional distribution hub for the Continent.

The outcome of this clash between public service and private initiative hinges in the short term on the commission's ruling on the IECC complaint and the reactions of UPU members at next year's conference. Europe's post offices accept that they have a fight on their hands. "In parts of the world the private companies have taken the post offices to the cleaners and we are not going to let them down and take it," says Mr Briscoe. "I think they thought we were easy meat, but we are not."

## Hicksville Redux

Does anyone remember the dismissive references to Ian Smith as "Surbiton in Africa"? Or the late David Holden's description of Rhodesians behaving as if after a collective frontal lobotomy? Maybe the time has come to apply the revisionist theory.

We could start with cricket, of course, which is about to be renamed Hicket, but which doesn't end with the great man himself. Paul Parker and Kevin Curran should be in the English team anyway, while Brian Davidson could be extracted from retirement to captain it. Even Gubbins, surely would do as wicketkeeper, because he would wear bigger gloves than at Anfield. There are also some very decent golfers. Nick Price nearly won the British Open this year and Mark McNulty is in the same class. A few years back Colin Dowdswell did rather well at Wimbledon.

If this conjures up images which create another stereotype — Rhodesians in "tackies" (tennis shoes) and shorts, strong on brawn, short on brain — think again. Robert Jackson survived the rugby fields of Falcon College near Bulawayo to become one of Mrs Thatcher's education ministers. Rupert Pennant-Rea (another Bulawayo boy, decent tennis player) is editing The Economist. Young William Burdett-Coutts (his father is chairman of the Zimbabwe Stock Exchange) is in charge of the Edinburgh Festival's Fringe. Merle Park graced the London ballet scene for years. John Gordon Davis has been on best seller lists, albeit not in the same category as Doris Lessing.

There are also one or two "honorary" Rhodesians, so designated on the grounds that the country moulded them during their formative years, such as Malcolm Rifkind, Secretary

of State for Scotland, ex-University of Rhodesia, and Pity Rowland, of London, who first discovered his entrepreneurial flair in Rhodesia.

It is a range of talent that Surbiton will never send into the world. For an answer I turned to Michael Holman, the FT's Africa Editor (born Ghana), whose theory runs roughly like this.

Perhaps it says something about the nature versus nurture debate. In a way, Rhodesia did come from Surbiton, though some had a pedigree that went back to the 1890 settlers. But many, reluctant as they are to admit it, were "Brits", arriving as part of the three waves of immigrants — after the Second World War, during the boom years of the Central Africa Federation, or during the Ian Smith heyday of the early 1970s. They must then have assimilated at least some of the values (or perhaps reacted against them), and learnt the skills, that subsequently stood them so well.

The tide then turned, and all but 75,000 left Rhodesia, now Zimbabwe, for different reasons. But something has helped many to emerge from the process of assimilation (or re-assimilation) and flourish in sport, the arts, politics, medicine, journalism, and other careers.

It may of course be a privileged background, or the frontier spirit transplanted from Africa — although many Rhodesians got no closer to the bush than frying sausages on the braai at the rugby club. For some, adversity brought inspiration and determination. Perhaps it's simply that every displaced or relocated minority, given resources and opportunity, makes a special effort — like Uganda's Asians. Perhaps Graeme Hick could tell the English cricket team what it is.

## OBSERVER



"I desperately want to join Alcoholics Anonymous but I can't seem to find the time."

## Hiccoughs

Did you know that Japanese exports of bananas to Italy, rubber boots to Belgium, razor blades to Spain, dinner plates to West Germany and forks and spoons to Denmark are all restricted by quotas? Well, they are, and the Japanese Government is very upset about it. It is not that these products are, or ever have been, at the forefront of Japan's export drive. Nor have the quotas on these and some 80 other Japanese products in various European countries had much of a dampening effect on Japan's trade surpluses with the EC, which was running at a cool \$1.9bn last month. No, it is the principle of the thing. The Japanese find it insulting that most of the quotas are directed specifically at them. "Why on earth do the West Germans block our exports of tableware?" an exasperated trade official asks. "Our manufacturers could no longer be competitive there

even if the quotas were removed," he said. Most of them are leftovers from a time when Japanese trade practices in a number of traditional sectors were more aggressive than they are today. Others are more blatantly protectionist. Not surprisingly, the largest collection is in Spain, with 41, followed by Italy with 36, Portugal with 29 and France with 17. The only country with none is the UK. The Japanese Government is thinking of taking the EC to the GATT over the matter. The EC Commission would rather see it put into the Uruguay Round. No comment has been heard from the Japanese banana sector.

## Hickory

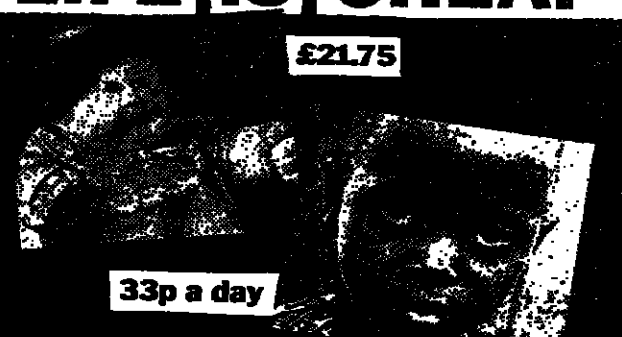
Whenever a vice presidential running mate is picked in the US, the hypebolism that follows is more aggressive than they are today. Others are more blatantly protectionist. Not surprisingly, the largest collection is in Spain, with 41, followed by Italy with 36, Portugal with 29 and France with 17. The only country with none is the UK. The Japanese Government is thinking of taking the EC to the GATT over the matter. The EC Commission would rather see it put into the Uruguay Round. No comment has been heard from the Japanese banana sector.

## Hic transit

It was Barnum, Bailey or both who made a fast buck by charging customers to see the egress, and some old tricks are too good not to repeat. Thus, when the heavens opened on the Hampton Court maze on Saturday afternoon, one bright young spark, armed only with a knowing smile and a makeshift map, was doing a tidy business showing bewildered tourists the way out, at 50p a head.

Jurek Martin

## LIFE IS CHEAP



While the Western World buys life little luxuries, elsewhere in many developing countries life itself is the luxury. Yet just 33p a day — little more than the cost of a daily newspaper — is all it takes to sponsor a child towards a more certain future. The money — and every penny of your sponsorship — goes overseas and will be used to provide practical help.

It may be clean water, health care, basic schooling, or seeds, tools and agricultural training that will help the child's family and local community to work towards self-reliance.

**A CHILD NEEDS YOU**  
 The link between you and the child is vital. You will be able to see the practical improvements your money is making.  
 You will receive a photograph of the child, regular reports about his or her progress and help. You will be able to write to your sponsored child and your child is able to write to you.  
 Every new sponsor means another child, another family has the chance of a better life. So please help. *Gifted. Foster. Adopt. Orphan. Life is not.*

**BE A SPONSOR**  
 Send to: The Rt. Hon. Christopher Chastaway, Chairman, ActionAid, Hamlyn House, Archway, London N19 5PC.  
☐ Please send me details of one child who needs my help. I enclose £10 as my first month's contribution.  
☐ I enclose £10 as my first year's contribution (I tick ONE box).  
☐ I can't be a sponsor now but enclose a gift (I tick ONE box) of £200 ☐ £100 ☐ £50 ☐ £25 ☐ £10 ☐ £5.  
 Please send me further details on sponsorship. Important: All cheques and postal orders should be made payable to ActionAid. Thank you.

Name (Mr/Ms) \_\_\_\_\_ (Mandatory)  
 Address \_\_\_\_\_  
 Postcode \_\_\_\_\_ Tel: \_\_\_\_\_  
**ActionAid**



# When trust is destroyed

Swedes have traditionally



placed enormous trust in their      was seen to start outside

The authorities were considered well-organised and efficient when it came to dealing with routine business, but have proved they are completely thrown by anything out of the ordinary like a political assassination. The last one (of King Gustav III) took place in 1792, and the Swedish police and secret service seemed to have little reason to build up a competent anti-terrorist squad: the threat of terrorist activities

ordered Palme's assassination because he threatened to halt illegal arms sales - though there is no evidence for this. Such a theory would raise the murder to a more international level - but it also conceals the real fear that such a well-ordered society could have produced the killer itself.



The fact that these resolutions have been largely declaratory, reflecting the frustrations of Third World

# Questions of right and might

Thus, the "success" of the UN in ending this war is rather modest by the standards that its founders expected of it. It



And the question they are putting to the UN is one which all the UN's members should be putting to themselves: Does the present international system amount to anything more than a rationalisation of might is right? If the UN goes on pretending not to know who started the war, or that it doesn't matter, and if the only lesson the world is left to draw from Iraq's use of chemical weapons is that Iran was foolish not to retaliate in kind, then the answer must be that it does not.

## LETTERS

Even those ignorant colonialists must surely know that this cannot be done without first creating a Commission, a Council of Ministers, a Committee of Permanent Representatives, a Common Agricultural Policy, steel production

**Chris Jones**  
20 Wilberforce Road,  
Sandgate,  
Folkestone, Kent

That may be right, but I think the publicity given to the talks throws up the fact that business dealings with continental Europe are much more complex than those we are used to. Sensitivities are

heightened, prospects are -- to  
 put it at its lowest -- exciting,  
 and the goal in front of us infinitely  
 more challenging than anything  
 this country has ever  
 faced up to in a business sense.  
 If Royal Insurance (or indeed  
 anyone else) is put off by its  
 experience, I think it deserves  
 some paternal "tea" but no  
 "sympathy."  
 James Gore Browne  
 Office C127  
 Fruit & Vegetable Market  
 New Covent Garden Market,  
 SW8

**Sir, After yet another rise in base rates I begin to question whether this old method of trying to restrict expenditure and thereby reduce the trade gap is still effective. Some potential borrowers may be deterred from taking on larger mortgages, but there is unlikely to be any real check on the public spending spree.**

The consumer boom is surely fuelled by the credit available in the high street. I do not believe the public is discouraged from purchasing new goods as a result of higher base rates. The only restraining factor appears to be the availability of credit, not the cost of servicing the debt.

Banks, hire purchase companies and the stores themselves

are keen to provide more and more credit because of its enormous profitability. An apparent way to stem such credit would be for the Bank of England to insist that banks deposit a percentage of the total sum they have lent out for personal finance in a special low-yielding account.

When the potential profit is reduced it is likely that there

would be much less pressure put on people to open credit accounts they cannot really afford. If it avoided base rate rises there should be no adverse effect on other industrial and commercial borrowers.

**Richard Ingham,**  
*The White House,*  
*100. Wimbledon Hill Road,*  
*SW19*

Sir, There is one fiscal measure the Chancellor can resort to now, quickly and effectively, without nullifying any of the tax changes made in the last budget (I repeat, it would actually reduce them), the philosophy behind several of the adjustments made in March).

That is to raise car tax from the present 10 per cent to between 20 per cent and 30 per cent, which would bring tax on cars more into line with the rates prevailing in other European countries without an indigenous automotive indus-

Unlike a rise in VAT, it would have a specific impact only. At the same time it would rein in car imports (the fastest growing component in our trade deficit), cut consumer spending dramatically, reduce inflation, and actually have a beneficial impact on the environment – all at the price of only the predictable moans from the likes of Nissan and Rover, where further mollycoddling may now presumably be regarded as inappropriate.

Fony Kay  
 14 St Paul's Crescent, NW1

First, the European Space Agency (ESA) is essentially a research and development organisation. It was responsible for the development of Ariane 1, 2, 3 and 4 launchers and is now undertaking the development of Ariane 5.

**Agency.** It has been created under ESA initiative in 1980 in order to produce, commercialise and launch operational launchers. It is a French joint stock company (*société anonyme*), with 50 shareholder partners representing the scientific, financial and political capabilities of 11 European countries.

**H. Aamotsbakken**  
**Head of the Public Relations Division**  
**European Space Agency**  
**8-10 rue Mario-Nikis**  
**75738 Paris Cedex 15**  
**France**

Sir, The introduction ("Tenacity in adversity") to your August 15 survey of Mozambique, on Mozambique's post-independence political development, was seriously undermined by reference to the recent US State Department Mozambican refugee report, and the reiteration of statistics contained within it.

Commissioned by the State Department, an institution already obviously hostile to the

Lozomque National Resistance (Rensamo), the report itself was flawed both conceptually and methodologically. The figure of 100,000 deaths, carried unquestioningly in the survey, was somehow extrapolated by the researcher from interviews with fewer than 50 refugees, in centres controlled neither by Frelimo or their military allies, using translators the researcher admitted were hostile to Rensamo.

on popular, not coercive, support from the Mozambican masses is clear from its military presence throughout the country - and from independent journalists, television crews and missionaries. Peter Godwin of the Sunday Times has even quoted Zimbabwean soldiers stating: "These Bemba are good. They control the countryside. The local people support them".

Peace in Mozambique can only be achieved by dialogue

between Mozambicans, and despite Frelimo's concerted propaganda war to the contrary, Renamo is a legitimate political actor within Mozambique. Its calls for a ceasefire, the withdrawal of foreign military forces, national reconciliation and free elections are prerequisites for a stable Mozambique.

Dominic Collins,  
Mozambique Solidarity Campaign,  
27 Old Gloucester Street, WC1



**Engineered like no other  
*used* car in the world**

new after 50, 70, or 100,000 miles.

which case, can you afford not to have one?

---

**ENGINEERED LIKE NO OTHER CAR**

**This symbol is exclusive to officially appointed Mercedes-Benz dealers**





## No Prague Spring allowed in Moscow

By John Lloyd in Moscow

"THERE IS," said Sergei Grigoryants, "no Prague Spring in Moscow."

In a cramped room in a little flat in one block among many in the featureless northern Moscow suburb of Babushkin, Mr Grigoryants, a veteran dissident of many years in labour camps and a broken nose to show for it, told those reporters who had been able to find him yesterday that the demonstration called in Moscow's Pushkin Square on Sunday to protest, 20 years on, against the Soviet intervention in Czechoslovakia, had ended in the clinical thugery of a secret police action.

"These events are not coincidental. They mark a sharp change in the poli-

tics of this country," he said. "The coming of a new and terrifying time."

What happened, he claimed, was this. The Democratic Union, the little group which gamely plugs away at the notion of changing the Soviet Union to a multi-party democracy, had applied for the right to hold a demonstration marking the 20th anniversary of the intervention. It was refused. The group went ahead anyway. The militia sealed off the group and a few supporters, stopped them from speaking soon after they began, and hustled them into buses.

Mr Grigoryants, who is associated with the group but was not billed to speak, attended the demonstration and

witnessed the police action against it. It was brutal, he says, and carried out by a new squad of plainclothes officers, "trained to kill, with the faces of criminals," who arrested some 150 people in Pushkin Square and dragged them off to police stations.

The police had been particularly keen to get at Vera Novodvorskaya, one of the union's leaders, when Andrei Novikov, a blond scarecrow of a man who appeared with Mr Grigoryants, tried to interpose himself, he was savagely beaten, he said.

Mr Grigoryants and others present yesterday said they witnessed beatings by the plainclothes men in police sta-

tions to which the protesters were taken. Mr Grigoryants said 150 people were arrested in the square, of whom between 30 and 50 had been beaten.

The Soviet authorities would make no comment last night on the incident - although there is likely to be a response to the accusations in the next day or so. Demonstrations in general have been tolerated over the past year, but the theme of multi-party democracy, and of support for the Prague Spring, seem to have breached glasnost's limits.

● The Council of Ministers has called for a series of measures to improve shops and catering establishments.

## Takeshita's delicate task in China

Ian Rodger reports on a test for Japan's political role in Asia

WILL JAPAN emerge from its shell and exercise political, as well as economic, leadership in East Asia?

Mr Noboru Takeshita, Japan's Prime Minister, may provide some clues when he meets Chinese leaders in Peking later this week. One of the most interesting items on his agenda will be Kampuchea.

Japanese Foreign Ministry officials regard the Kampuchean problem as a test case of Japan's desire to develop its role in the region. Dealing with the Chinese involvement in Kampuchea may be the most difficult part of that test.

In the Japanese view, China's support for the Khmer Rouge in Kampuchea is probably the main stumbling block to a solution, but, because of Japan's own delicate relations with China, Mr Takeshita will have to approach the issue with great care when in Peking.

Until recently, Japan has kept its relations with its Asian neighbours on an arm's length basis. It has been content to secure low-cost raw materials and intermediate goods and, in return, provide a considerable amount of economic co-operation.

But political involvement has been kept to a minimum, not least because there is deep anti-Japanese sentiment in most of these countries, going back to the Second World War. Also, the Japanese people tend to be even less patient with Asians than they are with other foreigners.

Today, Japan's economic strength is such that it has to take on more responsibility in the political arena as well. The Japanese have recognised this, and last spring Mr Takeshita announced a two-pronged policy, committing the Government to increased overseas aid and to participating in peace-making and peacekeeping efforts in regional conflicts. Already, the Japanese have been intimately involved in the Iran-Iraq and Afghanistan questions.

However, in both cases, Japan has played only a supporting role, providing funds, equipment and a very few civilian personnel. It is much more difficult for Japan to take a



Noboru Takeshita: Two-pronged approach to regional policy

leading role in any foreign political problem, because the country, which has forsworn the acquisition of military power, has very few tools with which to influence others. A senior Foreign Ministry official observed the other day that Japan's combination of immense economic power and no military power had never happened before in history.

"We will have to invent a new type of diplomacy," he said. Kampuchea is, in many ways, an ideal test case. It is a small country of little economic interest to Japan. Also, the Japanese have not been involved in its past. Thus, no one is likely to accuse them of ulterior motives for joining efforts to find a solution to the 10-year conflict there.

However, Kampuchea is part of the East Asian region, and Japan has an interest in stability in its own backyard. Also, the Japanese are uniquely qualified to provide what will be most needed by all concerned, including Vietnam, when a solution is found

- money and training.

The Japanese initiative on Kampuchea, if it can be called that, began early this year when Mr Sosuke Uno, the Foreign Minister, said publicly that Japan intended to play a role, and that it supported Prince Norodom Sihanouk as the only plausible leader of a new government in the country. Mr Uno attended a foreign ministers' meeting of the Association of South-East Asian Nations in Bangkok early in July and visited a Kampuchean refugee camp.

Japan also made clear its willingness to participate in the proposed international control commission that would be established to supervise elections and ensure order after the Vietnamese forces withdrew.

The Japanese, like everyone else, were startled when Prince Sihanouk suddenly resigned in mid-July as head of the coalition of Kampuchean political groups in exile (CGDK), but they maintained their commit-

ment to him. Indeed, they intensified it two weeks ago when the Prince began a well-publicised eight-day informal visit to Tokyo at the Government's invitation.

"It must have been a calculated move to make himself more free than he was within the CGDK," a Japanese official said last week of Prince Sihanouk's resignation. "We still believe he is the only one who can lead the country."

The view in the Japanese Foreign Ministry, as Mr Takeshita goes to Peking this week, is that the peace process among the various Kampuchean factions is well underway.

Vietnam, under increasing Soviet pressure, has committed itself to withdrawal of its troops from Kampuchea by the end of next year, although the Japanese would like to see a precise schedule and international supervision. Further meetings of leaders of the main factions are scheduled for the autumn following their informal meeting in Jakarta in July.

The Japanese were particularly heartened by the chairman's summary at the Jakarta meeting making a link between what they see as the two key requirements for a solution: withdrawal of the Vietnamese troops and an assurance that the genocidal policies of the former Pol Pot regime would not be re-established.

Japanese officials saw this as a significant defeat for the Khmer Rouge and, by implication, for their Chinese backers. They note that both the Khmer Rouge and the Chinese have since made statements that could be interpreted as indicating flexibility on the structure of a future government in Kampuchea.

Thus, Mr Takeshita is in a delicate position as he goes to Peking. Should he push the Chinese fairly hard, and risk offending them and upsetting his own country's bilateral relations with China, or should he touch on Kampuchea only lightly, and risk having Japan once again appear ineffectual in the diplomatic arena? That, of course, is the stuff of diplomacy, as the Japanese are now learning.

## Pretoria bans group opposing conscription

By Anthony Robinson in Johannesburg

MR ADRIAN VLOK, South Africa's Minister of Law and Order, yesterday moved to crush opposition to the Apartheid war and white conscription by banning the End Conscription Campaign.

The ban, published in yesterday's official Gazette, was similar to the blanket restriction on the activities of 17 anti-apartheid organisations imposed on February 24.

It forbids the organisation to "carry on or perform any act" and is a direct response to last month's declaration by 143 conscription-age whites that they refused to serve in South Africa's "racist" army and demanded a "peaceful alternative service in non-government bodies".

Meanwhile the Government yesterday withdrew proposed changes to the Group Areas Act that would have called for mandatory eviction of people living in neighbourhoods reserved for another race.

Mr Chris Heunis, Minister of Constitutional Development and Planning, said the bill amending the act would be reintroduced with changes specifying that evictions would not be mandatory.

The amended bill would allow officials to consider the availability of alternative housing and other "humanitarian considerations" before approving evictions, he said.

Parliament reconvened in Cape Town yesterday to debate the changes but leaders of the Indian and coloured chambers announced that their houses would adjourn indefinitely to oppose the new legislation.

Last week Mr Harry Oppenheimer, former head of the Anglo-American Corporation and Mr Anton Rupert, chairman of the Rembrandt Group and doyen of Afrikaner private enterprise, both appealed to the Government to reconsider before going ahead with its planned changes to the act.

The amended law would have provided for the legislation, for the first time, of racially mixed housing in certain well defined areas. But it also stipulated heavy fines, imprisonment, property confiscation and evictions for people who have, until now, evaded this fundamental apartheid law. These are likely to be retained in the new bill.

The law has proved unworkable in practice because of the artificially induced backlog of black and coloured housing and a growing surplus of white housing in inner city areas.

Last week President P.W. Botha put his personal stamp on the proposed legislation when he told the Natal Congress of the ruling National Party he believed that 80 per cent of whites and 70 per cent of coloureds and Indians were in favour of maintaining their own ethnic housing areas.

The decision to press on with the bill caused disquiet in the business community.

Foreign governments and embassies have warned that the resulting mass evictions could spark off a fresh wave of domestic unrest and give an impetus to anti-apartheid and sanctions lobbies abroad. Editorial Comment, Page 10

## Australia, US to expand Pacific airline services

By Chris Sherwell in Sydney

AUSTRALIA and the US have ended a protracted dispute over air rights with an agreement that expands airline services across the Pacific and provides for automatic increases in future capacity.

The two sides hammered out the deal in Canberra at the weekend after several rounds of talks at official and ministerial level over almost 2½ years.

According to Senator Gareth Evans, outgoing Minister for Transport and Communications, the package is "a major breakthrough, enormously significant to the Australian tourism industry and to airline passengers."

Qantas, Australia's state-owned international carrier, will be able to serve 15 US cities. It currently has rights to Honolulu, Los Angeles, San

Francisco and New York and has gained access to three new ones and a further eight through these "primary" gateways.

US airlines - principally United and Continental - have similarly increased their access to Australia. Whereas they flew only to Sydney, Melbourne, Perth and Darwin, they can now add Brisbane, Cairns and one other city still to be chosen, and have access to eight other cities beyond.

One key feature of the agreement is an anti-dumping mechanism under which uncoordinated excess capacity on the trans-Pacific routes can be avoided. In addition, a new route between Guam and Australia for both sides was agreed, and Qantas will join other US airlines on routes to the US via the North Pacific.

## English raise glasses to all-day opening hours

Continued from Page 1

"Trust the people not to get drunk."

On the whole, this enlightened approach seemed to be working yesterday although a small number of extremists held out in a few pubs. "I'm here to prove she's wrong," said one tippler in a West London pub, "for political reasons of course."

However, at Ye Olde London pub, 200 yards from St Paul's Cathedral where a mere four customers lingered over their drinks at 3:15pm, manager Bela Benyal said: "We expected it to be really busy today, particularly because we thought people would be celebrating. We will give it a six months trial."

Elsewhere publicans and the police appeared to agree that the country had not been engulfed in an orgy of mass

absenteeism and drinking.

"We have not had one person who has drunk right through the lunchtime session into the post three o'clock period," said Mr Terry McCormack, licensee of the Three Tuns in London's busy West End.

Publicans in England and Wales - where the legislation applies - expect it will take some weeks before they can evaluate whether or not it is in their interests to take advantage of the Government's new licensing law which allows pubs to stay open from 11am to 11pm except on Sundays when they can stay open until 3pm.

But traditions die hard in Britain. A survey of pub owners has shown that half the 67,000 bars in England and Wales intend to stick to the old hours

## Dollar rises despite banks' intervention

Continued from Page 1

can presidential candidate, is elected in November.

European officials dismiss such interpretations. They note that the US electorate has elected a candidate with a deteriorating trade position for years. In electoral terms, the dollar depreciating by 10 pennings does not compare to the recent rise in US interest rates, they said.

The strength of the dollar has, however, fuelled speculation that interest rates in Europe will rise again. The Bundesbank will have two occasions this week to reconsider its interest policy: today

when it announces the terms of its latest securities repurchase ("repo") agreement with its local banks; and on Thursday when the board of the central bank meets.

Opinion is divided as to whether the central bank will seek to raise the repo rate from the current level of 4½ per cent to 4½ per cent. Like the Fed Funds rate in the US, the repo rate has now assumed the role as the barometer of the Bundesbank's monetary policy intentions.

Analysts say that any move by the West German authorities to increase interest rates

from their current levels would put pressure on France to match the rise.

It may also increase the pressure on British monetary authorities to also increase bank rates. UK money markets were yesterday discounting another ¼ percentage point rise in base rates after sterling weakened.

In London the pound closed at \$1.8765 compared with \$1.7020 on Friday, and at DM3.2175 compared with DM3.22. On the Bank of England's trade-weighted sterling index the pound closed 0.5 points lower at 76.2.

## WORLD WEATHER

Place	F	C	Place	F	C	Place	F	C	Place	F	C
Algeria	51	11	London	51	11	Paris	51	11	Stockholm	41	5
Athens	51	11	Madrid	51	11	Rome	51	11	Toronto	31	-1
Bahia	51	11	Moscow	41	5	Sofia	41	5	Winnipeg	21	-7
Bangkok	51	11	Nairobi	51	11	Thessalonika	41	5	Xinjiang	11	-11
Bombay	51	11	Reykjavik	41	5	Yokohama	51	11			
Buenos Aires	51	11	Sao Paulo	51	11						
Calcutta	51	11									
Cairo	51	11									
Cardiff	51	11									
Chongqing	51	11									
Copenhagen	51	11									
Dallas	51	11									
Dublin	51	11									
Hankow	51	11									
Hong Kong	51	11									
Kobe	51	11									
London	51	11									
Los Angeles	51	11									
Lyons	51	11									
Manila	51	11									
Moscow	41	5									
Mumbai	51	11									
Nairobi	51	11									
Reykjavik	41	5									
Rome	51	11									
Sao Paulo	51	11									
Shanghai	51	11									
Singapore	51	11									
Sofia	41	5									
Tokyo	51	11									
Yokohama	51	11									

Source: British Meteorological Office. Figures are for 12-hour period ending 22.00 GMT on 22/8/88.

Forecast for 23/8/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 24/8/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 25/8/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 26/8/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 27/8/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 28/8/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 29/8/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 30/8/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 31/8/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 1/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 2/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 3/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 4/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 5/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 6/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 7/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 8/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 9/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 10/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 11/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 12/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 13/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 14/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 15/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 16/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 17/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 18/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 19/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 20/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 21/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 22/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 23/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 24/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 25/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 26/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 27/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 28/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 29/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 30/9/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 1/10/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 2/10/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 3/10/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 4/10/88: High 51, Low 41, Wind S.W. 10-15 mph, Rain 10-15 mm.

Forecast for 5/10/88: High 51, Low 41, Wind S.W. 10-1







All of these securities having been sold, this announcement appears as a matter of record only.

**\$250,000,000**

## Joseph E. Seagram & Sons, Inc.

**9.65% Guaranteed Debentures due August 15, 2018**

Guaranteed as to Payment of Principal and Interest by

## The Seagram Company Ltd.

Goldman, Sachs & Co.

Salomon Brothers Inc	The First Boston Corporation	Bear, Stearns & Co. Inc.
Merrill Lynch Capital Markets	Morgan Stanley & Co. Incorporated	Shearson Lehman Hutton Inc.
ABD Securities Corporation		Commerzbank Capital Markets Corporation
Daiwa Securities America Inc.	Deutsche Bank Capital Corporation	Dillon, Read & Co. Inc.
Donaldson, Lufkin & Jenrette Securities Corporation	Drexel Burnham Lambert Incorporated	Kidder, Peabody & Co. Incorporated
Lazard Frères & Co.	The Nikko Securities Co. International, Inc.	Nomura Securities International, Inc.
PaineWebber Incorporated	Paribas Corporation	Prudential-Bache Capital Funding
L.F. Rothschild & Co. Incorporated	SBCI Swiss Bank Corporation	Investment banking
Smith Barney, Harris Upham & Co. Incorporated	UBS Securities Inc.	Wertheim Schroder & Co. Incorporated
Dean Witter Capital Markets		Yamaichi International (America), Inc.

August, 1988

## INTERNATIONAL COMPANIES AND FINANCE

### First Boston likely to go private

THE EXPECTED restructuring of First Boston is likely to include the buyout of its publicly-held shares, according to analysts. Reuter reports from New York.

First Boston said in May that it was talking with Credit Suisse about forming a global investment banking company from the activities of First Boston and Financière Cr dit Suisse First Boston.

Since then, the company's stock has been buoyed by growing speculation that the reorganisation will include the purchase of First Boston's stock.

Mr Peter Buchanan, First Boston president and chief executive officer, said: "You can just quote the statement we made in May." Credit Suisse was not available for comment.

An analyst said: "The consensus is that it's going to be major and it's going to take the public out of First Boston." It is thought that First Boston to make an announcement on a restructuring in about a month.

Credit Suisse and First Boston own 60 per cent and 40 per cent respectively of Cr dit Suisse First Boston. Cr dit Suisse First Boston in turn owns 40 per cent of First Boston, with the rest of First Boston owned by employees and the public.

Sources at First Boston declined knowledge of the talks and said senior management had been extremely tight-lipped about its plans. The company's reticence has not kept Wall Street from speculating on what a realignment may entail.

Mr Charles Vincent, analyst at Provident National Bank, said: "It looks like First Boston, like many other firms, is going through a period of strategic planning." It is estimated that taking First Boston private would cost the company more than \$800m, assuming a buyout price of \$45 to \$50 a share. But a simple leveraged buyout is unlikely because of the cost.

First Boston has performed well following defections by investment banking co-heads Mr Bruce Wasserstein and Mr Joseph Perella, but it faces strong competition.

## SCEcorp boosts offer for San Diego Gas to \$2.3bn

By Roderick Oram in New York

SCEcorp, parent of Southern California Edison, has increased the pressure on San Diego Gas and Electric, a neighbouring utility, by improving to about \$2.28bn the value of its share swap take-over offer.

Merger of the two companies, which SCEcorp first proposed a month ago, would create the largest electric utility in the country with 78 gigawatts of generating capacity, 4.7m customers and \$6.7bn of annual revenues.

Los Angeles-based SCEcorp reiterated its main condition, however, that San Diego Gas and Electric drop its own bid for Tucson Electric Power, a stock swap worth about \$1.9bn.

SCEcorp's improved offer is the exchange of 1.2 of its

shares, compared with 1.15 originally, for each common share in San Diego Gas and Electric, plus a one-for-one swap of its preferred shares. SCEcorp's shares gained 3% to \$31.4 and San Diego's rose 3% to \$34.4 in early trading.

The target company, whose board was due to meet later yesterday to consider the offer, declined to comment on the latest SCEcorp move.

SCEcorp estimates a merger would generate some \$350m in cost savings over the next 10 years, which could encourage California utility regulators to approve the deal.

The bids by SCEcorp and San Diego for neighbouring utilities is part of a merger wave in the US electric industry which has triggered by the

Public Utilities Regulatory Power Act in 1978.

It undercut utilities' monopolies by requiring them to buy reasonably priced electricity from independent generators. As a result, smaller utilities have come under increasing competitive pressure.

Shamrock Holdings is no longer seeking a preliminary injunction bearing in Delaware chancery court against Polaroid's recent stock issue and has asked instead for an expedited trial on the matter, according to Shamrock lawyers. Reuter reports from New York.

The lawyers would not comment on the reasons for the move, which was disclosed in a letter to Delaware court last week.

### Cambior reopens gold mine in NW Quebec

By Robert Gibbens in Montreal

CAMBIOR, the gold-mining group 30 per cent held by the Quebec Government, has reopened the old Eldrich Flavel mine in the Rouyn-Noranda area of north-western Quebec, and plans to produce 40,000 ounces in 1989.

The reopened mine will make a modest contribution to Cambior's projected production of well over 200,000 oz next year, but Mr Louis Gignac, Cambior's president, said the group's costs of C\$340 (US\$277) per oz should be reduced by increasing reserves at the lower levels.

The mine has been renamed Pierre Beauchemin mine after a Quebec developer.

The company also expects to bring two more small gold mines into production in the same area, and another in the famous Val d'Or area in the near future. Cambior's main source of income is a half share in the Doyon gold mine in Rouyn-Noranda.

The other half is owned by Lac Minerals. Cambior's share of production last year was about 125,000 oz.

Doyon accounts for one quarter of all Quebec's gold production, and the mill is being expanded.

Cambior was formed two

years ago from the privatisation of the operating side of the Quebec Government's Soquem mining and exploration group.

It has raised funds since in Europe and has absorbed old Sullivan mines. It has just sold an interest in an Ontario gold mine for C\$52m. Cambior also has three gold properties in the US.

In 1987, earnings were C\$21.5m, or 95 cents a share, on revenues of C\$93m. First-half results this year indicate an improvement for all 1988.

Inter-City Gas, a western utility and energy firm controlled 40 per cent by Central Capital, a fast-growing Toronto-based national financial services group, with assets of C\$12.5bn at the end of 1987, is the mystery buyer of a 9.4 per cent equity interest in Ranger Oil.

Inter-City has paid more than C\$50m for just over 7m Ranger shares, saying the deal is for investment purposes.

Ranger has production and exploration interests in the North Sea, South-east Asia and Australasia.

Inter-City's oil and gas assets are located in Western Canada and the US. Revenues this year are expected to be about C\$56m.

### Aircraft sales help SAS post 37% profit rise

By Sara Webb in Stockholm

SCANDINAVIAN Airlines System (SAS) yesterday reported a 37 per cent rise in profit for the first six months of 1988 with much of the increase stemming from the sale of aircraft.

Profit before extraordinary items rose to SKr1.05bn (\$162m), with fixed asset sales contributing SKr976m. In the first six months of 1987, similar sales contributed SKr242m to a profit of SKr767m.

Group revenue increased by 12.8 per cent to SKr13bn. SAS said the underlying airline business had performed well and that all business areas with the exception of Vingtor, its package holiday operation, had shown profit increases during the first six months.

Profit before extraordinary items for the airline increased to SKr976m from SKr701m a year ago, helped by increases in domestic and European traffic as well as by a cost-cutting programme.

Full-year figures this year are expected to be "slightly better" than last year. SAS recently agreed to buy into Aerolineas Argentinas of Argentina.

This announcement appears as a matter of record only



**MAXWELL**  
COMMUNICATION CORPORATION plc

has acquired  
IBM's wholly owned subsidiary

**SCIENCE RESEARCH ASSOCIATES (SRA)**

and its subsidiaries in Australia, Canada and  
in the United Kingdom

for  
US \$ 150 MILLION

The financing has been arranged and provided by

**DRESDNER BANK AKTIENGESSELLSCHAFT**  
- London Branch -



July 1988

# HYUNDAI

## Catch The Olympic Spirit

For us at Hyundai, the Olympic Games are something special. Special because they call for the same dedication, commitment, and outstanding performance that we do.

The spirit of achievement is what gives life to the Olympics, and what guides the Hyundai Business Group. It's why we've succeeded in many key industrial sectors, such as automobiles, construction, shipbuilding and steel in the world, and it's why we will continue to set the pace in high-technology fields of electronics, robotics and communications without knowing any limitations.

Hyundai's philosophy of consistent commitment to customer satisfaction has proven itself, making possible Olympic-class achievements time after time and it will surely continue to be our philosophy of business in the future.

Hyundai, Olympians in Business.

**HYUNDAI**  
140-2 Kye-dong, Chongro-ku, Seoul, Korea.  
TEL: 741-2111/20, 741-4141/70  
TLX: HYUNDAI K23111/S, K23175/7HD CORP.



## INTERNATIONAL COMPANIES AND FINANCE

## Statoil expects gloomy future

By Karen Fosell in Oslo

THE PORTFOLIO of income-producing activities of Statoil, Norway's troubled state oil company, is not robust enough to counteract low oil and gas prices, according to Mr Harald Norvik, Statoil's chief executive.

Mr Norvik said in an interview he was prepared for the company to experience poor financial results in the next two to three years.

Statoil plunged into the red last year when it was forced to make write-offs of Nkr3bn (\$435m) because of cost overruns at the Mongstad refinery and terminal expansion project. Last week, the company reported pre-tax earnings almost halved to Nkr2.5bn because of lower oil prices and a lower dollar exchange rate.

The company's performance is strongly dependent on revenue from the Statoil oil and gas field and on transportation earnings for gas sent through the Statpipe line.

However, gas sales have become loss-making for the Norwegian Government. The

formula governing gas prices has reduced government receipts to less than the cost of transportation to Europe, where the gas is distributed to a consortium of Continental buyers.

The Mongstad project also continues to be a millstone around the company's neck and there is speculation by industry experts that the critical interfacing phase of the project - connecting the old part of the refinery with the new - could bring about a whole new series of challenges.

Indeed, Statoil also recently alluded to the potential for additional problems once the refinery is shut down from early September for the interfacing work.

Mongstad's annual refining capacity is being upgraded from 4m tonnes to 6.5m tonnes. Petrol production will also be increased fivefold to 3.5m tonnes from 500,000 tonnes. Statoil aims to have first products from the upgraded refinery available from January 1989.



Harald Norvik: need to achieve more than a few shillings

Statoil's problems have also stimulated political debate about its role. Indeed, Mr Norvik points to the "political trend towards introducing private shareholders" into the company as one way to reduce the increased risks to which the Government is exposed.

"Some people have advocated that some of its (the Gov-

ernment's) equity holding should be sold," Mr Norvik said. Statoil currently handles the Government's total ownership share in oil and gas projects, although the resulting monetary flow is shared between them.

He warns, however, that "the three business units - exploration and production, refining and marketing and petrochemicals - must be owned and run as an integrated company."

Mr Arne Oeien, Norway's oil and energy minister, said in June the Government intended to sell off shares it owns in oil and gas fields as another way to minimise its risk.

Mr Norvik believes the consequences of such sales should be thoroughly assessed, and raised the question of "whether selling to the highest bidder is the right course of action. We need to consider how to exploit the Government's offshore interests to achieve something more than just a few more shillings in the Government's coffers," he said.

## Saga Petroleum falls steeply in interim

By Our Oslo Correspondent

SAGA PETROLEUM, the Norwegian oil independent, expects a steep fall in first half-year profits to Nkr62m (\$8m) from Nkr25m in the same period last year despite a 26 per cent increase in oil, gas and condensate production.

Saga attributed the decrease to lower oil prices and a reduction in net financial income in the period.

Although the company expects year-end profits to be increased fivefold to 3.5m tonnes from 500,000 tonnes, it said there still remained a significant degree of uncertainty over future oil price developments and that year-end profits would depend primarily on the dollar exchange rate and the oil price.

Saga's operating costs climbed to Nkr654m in the latest period from Nkr563m a year earlier. Operating profits slipped to Nkr45m from Nkr62m last year. Conversely, operating revenue increased to Nkr989m from Nkr825m last year.

An analysis of the company by Union Bank of Norway said variations in the oil price and the dollar exchange rate are its greatest risk factors.

On August 1, Saga launched a five-year \$96m Eurobond at 10 1/2 per cent priced at 100%. Saga has until September 1 to decide if it will launch a separate convertible Eurobond of between \$100m and \$150m.

The company is gearing up for development of its Nkr31bn Snorre oil and gas field, by which its future prospects are heavily influenced.

## Daimler forecasts small rise in car sales

By Andrew Fisher in Frankfurt

DAIMLER-BENZ, the West German motor group with interests in electronics, engines, and aerospace, expects only a slight increase in its domestic car sales this year after a drop at home and a mixed performance abroad in the first seven months.

Daimler said sales in the German market should show a 1 per cent rise for the whole of 1988 aided by the introduction of its revamped Mercedes 190 compact model next month.

In the January-July period, domestic sales were 2.6 per cent lower at just over 168,000 units. The group has already said it is cutting output by 4

per cent, or 25,000 vehicles, this year from 598,000 in order to reduce high stock levels.

Worldwide, Daimler said its aim was for a near 2 per cent gain for the year.

Despite price increases caused by the dollar's fall in the past two years and the effect of October's stock market crash, its US sales were stronger than expected. They were down by 3 per cent to 62,500 cars, which Daimler said was the best performance among imports from Europe.

Sales in western Europe, outside Germany, were 10 per cent higher at 80,000 cars, while business in Japan during the January-July period showed a

16 per cent advance, at 7,300 units.

The group made no mention of its forward order situation for cars, widely thought in the industry to be down this year. Daimler has not commented on estimates that new orders were 13 per cent lower in the first five months, with the order backlog 30 per cent lower. But it has denied that short-time working would be introduced.

Daimler's attempts to prevent sales in the US from falling too sharply are, however, proving costly, according to Mr Stephen Reitman, European motor industry analyst with stockbrokers Phillips and Drew in London.

He said sales in Germany of the 190 had fallen by 15 per cent in the first half, partly as customers waited for the new model and partly because of competition from the BMW 3-series which has benefited from the success of its new larger 7-series and 5-series cars.

The company will not produce a successor to its ageing S-class series to compete with BMW's 7-series at the top of its range until 1990.

In the first half of 1988, domestic sales of the S-class were down by nearly 6 per cent compared with a rise of 13 per cent for the 7-series, said Mr Reitman.

## Rapid growth at United Paper Mills

By Olli Virtanen in Helsinki

UNITED Paper Mills, the Finnish forest products group whose interests include the Shotton newsprint plant in North Wales, reported rapid growth in both turnover and profit for the first six months of 1988.

Group turnover for the

period rose 14 per cent to Fm2.99bn (\$650m) while profit before appropriations and taxes rose 32 per cent to Fm387m.

The improvement, says Mr Nello Hakkarainen, managing director, reflects the high capacity utilisation at the paper mills, higher paper prices and a smooth start-up of a new mill at Kaipola, Finland, which performed better than forecast.

UPM produced a total of 640,139 tonnes of paper and paper board during the first six months, an increase of 13 per cent on output.

UPM also revealed that it had bought a majority stake in Stracel, a French pulp-making company.

The group plans to build a thermomechanical pulp plant and a newsprint plant with an annual capacity of 200,000 tonnes.

## Sandvik rise helped by strong demand

By Sara Webb in Stockholm

SANDVIK, the Swedish cemented carbide and special steels group, increased profits (after financial items) by 37 per cent to SKr1.25bn (\$193m) in the first six months, helped by strong demand for industrial equipment.

The group said that with the present favourable business climate and high levels of investment in industrial equipment, it expects full-year profits to reach SKr2.5bn, a 32 per cent increase on last year's figure of SKr1.89bn.

Sales in 1988 should show a 20 per cent increase on last year's figure of SKr13.24bn, Sandvik said.

The group's order intake increased by 32 per cent to SKr8.81bn in the first six months and sales rose by 26 per cent to SKr7.89bn. The increases were due to higher demand as well as to recent acquisitions in the US and in Europe.

Sales to the US market jumped by 65 per cent to SKr1.44bn while sales to Europe rose 20 per cent to SKr4.78bn.

Sandvik's steel operations showed an 88 per cent rise in profits to SKr281m, the strongest profit increase of all the divisions, the group said. The increase was partly due to better steel prices. Steel division sales rose by 29 per cent to SKr2.57bn.

Cemented carbide sales totalled SKr4.26bn, up 25 per cent on the previous year, while profits rose by 16 per cent to SKr765m.

## WOOLWICH EQUITABLE BUILDING SOCIETY

£200,000,000 Floating Rate Loan Notes Due 1995

In accordance with the terms and conditions of the Notes, which are hereby given that for the three months interest period from (including) 19th August, 1988 to (excluding) 21st August, 1988, the Notes will carry a rate of interest of 11 1/2 per cent per annum. The relevant interest payment date will be 21st November, 1988. The Coupon Amount per £10,000 will be £208.57, payable against surrender of Coupon No: 11. Hambros Bank Limited, Agent Bank.

## KLEINWORT BENSON FINANCE B.V.

US \$50 million Guaranteed Floating Rate Notes 1991

unconditionally and irrevocably guaranteed, as to payment of principal, premium (if any) and interest, by

KLEINWORT BENSON LONSDALE plc

For the three months 23rd August 1988 to 23rd November 1988, the Notes will carry a Rate of Interest of 8 1/4 per cent per annum with a Coupon Amount of US \$114.20

CHEMICAL BANK Agent Bank

## PREMIER GROUP HOLDINGS

U.S.\$50,000,000 Floating Rate Notes due 1989

NOTICE IS HEREBY GIVEN that the Rate of Interest for the second sub-period on Coupon No. 9 has been fixed at 9 3/4 per cent p.a. and that the interest payable in respect of U.S.\$10,000 nominal of the Notes will be U.S.\$239.58. The total amount due for Coupon No. 9 due November 23, 1988, will be U.S.\$473.22.

August 23, 1988 CITIBANK, N.A. (CISI Dept.), Agent Bank

## CHRISTIANA BANK OG KREDITKASSE

U.S.\$50,000,000 Floating Rate Notes due 1990

New Rate of Interest 9 3/4 per cent p.a. and that the interest payable in respect of U.S.\$10,000 nominal of the Notes will be U.S.\$239.58. The total amount due for Coupon No. 9 due November 23, 1988, will be U.S.\$473.22.

August 23, 1988 CITIBANK, N.A. (CISI Dept.), Agent Bank

## CITICORP BANKING CORPORATION

U.S.\$50,000,000 Floating Rate Notes due August 20, 1989

Notice is hereby given that the Rate of Interest for the period August 23, 1988 to November 23, 1988 has been fixed at 8 7/8 per cent and that the interest payable on the relevant interest payment date, November 23, 1988 against Coupon No. 9 in respect of U.S.\$10,000 nominal of the Notes will be U.S.\$223.93.

August 23, 1988, London CITIBANK, N.A. (CISI Dept.), Agent Bank

CITIBANK

## Manfor pulp mill for sale

By Robert Gibbons in Montreal

THE MANITOBA Government is negotiating to sell the Manfor pulp and kraft paper and lumber operations at The Pas, 450 miles north-west of Winnipeg.

Repap Enterprises, a large Montreal-based pulp and coated paper producer, is among several companies involved in preliminary negotiations, but Mr. George Petty, Repap's chairman, said: "No definite proposal is on the table as far as we are concerned."

Manfor is the old Churchill Forest Industries (Manitoba), a Swiss-backed pulp and paper project that went sour in the 1960s and was followed by

lengthy court actions. Ownership reverted to the province in 1973 to prevent closure and save jobs in a remote area. Since then, Manitoba has invested about C\$250m (US\$204m) in the mill.

The Manitoba Government said it was also negotiating with Weyerhaeuser Canada. It would not confirm reports that Repap would pay C\$130m for Manfor, to be retrieved through provincial grants.

Industry sources say the mill could double its capacity to 290,000 tonnes of paper, add a bleaching plant and then produce multilayer packaging paper for the US market.

All of these securities having been sold, this advertisement appears as a matter of record only.

4,862,000 Units

## BOND INTERNATIONAL GOLD, INC.

24,310,000 Ordinary Shares and 4,862,000 Warrants to Purchase Ordinary Shares

2,431,000 Units

Representing

12,155,000 Ordinary Shares and 2,431,000 Warrants to Purchase Ordinary Shares

This portion of the offering was offered outside the United States by the undersigned.

Goldman Sachs International Corp.

James Capel &amp; Co.

Banque Paribas Capital Markets Limited

Drexel Burnham Lambert Securities

Shearson Lehman Hutton International

Bank J. Vontobel &amp; Co. AG

BHF-Bank

IMI Capital Markets (UK) Ltd.

Merrill Lynch International &amp; Co.

N. M. Rothschild &amp; Sons Limited

Solomon Brothers International Limited

Union Bank of Switzerland (Securities) Limited

M.M. Warburg-Brinckmann, Wirtz &amp; Co.

Wardley Australia Securities Limited

Yamaichi International (Europe) Limited

2,431,000 Units

Representing

12,155,000 Ordinary Shares and 2,431,000 Warrants to Purchase Ordinary Shares

This portion of the offering was offered in the United States by the undersigned.

Goldman, Sachs &amp; Co.

Drexel Burnham Lambert

Shearson Lehman Hutton Inc.

Bear, Stearns &amp; Co. Inc.

Alex. Brown &amp; Sons

Dillon, Read &amp; Co. Inc.

Donaldson, Lufkin &amp; Jenrette

Kidder, Peabody &amp; Co.

Lazard Frères &amp; Co.

Merrill Lynch Capital Markets

PaineWebber Incorporated

Salomon Brothers Inc.

Wertheim Schroder &amp; Co.

Dean Witter Capital Markets

Advest, Inc.

Arnhold and S. Bleichroeder, Inc.

William Blair &amp; Company

J. C. Bradford &amp; Co.

A. G. Edwards &amp; Sons, Inc.

McDonald &amp; Company

Oppenheimer &amp; Co., Inc.

Piper, Jaffray &amp; Hopwood

Prescott, Ball &amp; Turben, Inc.

The Robinson-Humphrey Company, Inc.

Thomson McKinnon Securities Inc.

Tucker, Anthony &amp; R. L. Day, Inc.

Wheat, First Securities, Inc.

Robert W. Baird &amp; Co.

Bateman Eichler, Hill Richards

Blunt Ellis &amp; Loewi

Boettcher &amp; Company, Inc.

Butcher &amp; Singer Inc.

Cable, Howse &amp; Ragen

The Chicago Corporation

Cowen &amp; Co.

Fahnestock &amp; Co. Inc.

First Albany Corporation

Furman Selz Mager Dietz &amp; Birney

Grunat &amp; Co., Incorporated

Howard, Weil, Labouisse, Friedrichs

Interstate Securities Corporation

Janney Montgomery Scott Inc.

Johnson, Lane, Space, Smith &amp; Co., Inc.

Johnston, Lemon &amp; Co.

Ladenburg, Thalmann &amp; Co. Inc.

C.J. Lawrence, Morgan Grenfell Inc.

Legg Mason Wood Walker

Mabon, Nugent &amp; Co.

Morgan Keegan &amp; Company, Inc.

Needham &amp; Company, Inc.

Neuberger &amp; Berman

The Ohio Company

Raymond James &amp; Associates, Inc.

Stephens Inc.

Stifel, Nicolaus &amp; Company

Sutro &amp; Co.

August, 1988

U.S. \$150,000,000

## Chemical New York Corporation

Floating Rate Subordinated Notes Due 1996

Interest Accrual Period 27th May 1988 26th August 1988 (inclusive)

Interest Amount per U.S.\$10,000 Note due 6th September 1988 U.S.\$203.71

Credit Suisse First Boston Limited

Agent Bank

## NOTICE TO HOLDERS OF BONDS THE MITSUI TRUST AND BANKING COMPANY, LIMITED

U.S.\$100,000,000 2% PER CENT CONVERTIBLE BONDS 2001

ADJUSTMENTS OF CONVERSION PRICE

Pursuant to Clause 7 (B), (C) and (E) of the Trust Deed between The Mitsui Trust and Banking Company, Limited (the "Bank") and Bankers Trust Company Limited, as the Trustee, dated 30th September, 1986, in connection with the above-mentioned Bonds (the "Trust Deed"), you are hereby notified as follows:

1. (1) The Bank has made a public offering in Japan of 20,000,000 shares of common stock of the Bank at the issue price of 1,969 Japanese yen per share which is less than the current market price per share of 2,066 Japanese yen calculated as provided in the Trust Deed.

As a result of such public offering, the Conversion Price of the above-captioned Bonds at which shares of common stock of the Bank are issuable upon conversion of the Bonds have been adjusted, pursuant to Condition 3(C)(iv) of the Conditions of the Bonds, from 1,903.20 Japanese yen to 1,901.50 Japanese yen effective as of 23rd August, 1988 (Japan time).

(2) Furthermore, pursuant to resolutions passed at a meeting of Board of Directors of the Company held on 19th July, 1988, the Bank authorized a free distribution of shares of common stock of the Bank to shareholders of record as of 30th September, 1988 (Japan time) at the ratio of 0.05 new share per one share held.

Accordingly, the Conversion Price of the above-captioned Bonds will be further adjusted, pursuant to Condition 3(C)(v) of the Conditions of Bonds, from 1,901.50 Japanese yen to 1,811 Japanese yen effective as of 1st October, 1988 (Japan time).

2. As a result of the above-mentioned two adjustments of the Conversion Price of the Bonds, the first adjusted Conversion Price (1901.50 Japanese yen) will be applicable to the period from 23rd August, 1988 (Japan time) to 30th September, 1988 (Japan time) and the second adjusted Conversion Price (1811 Japanese yen) will be applicable as from 1st October, 1988 (Japan time).

The Mitsui Trust and Banking Company, Limited

Dated 23rd August, 1988

## FT City Seminar

Plasterers Hall, City of London 19, 20 & 21 September, 1988

FINANCIAL TIMES CONFERENCE

For information please return this advertisement, together with your business card, to:

Financial Times Conference Organisation

128 Jermyn Street London SW1Y 4UJ

Alternatively, telephone: 01-925 2323

telex 27347 FTCONF G

Fax: 01-925 2125



## INTERNATIONAL CAPITAL MARKETS AND COMPANIES

## Strong metal prices boost MIM

By Chris Sherwell in Sydney

STRENGTHENED copper and lead prices contributed significantly to the powerful surge in profits reported yesterday by MIM Holdings, the Brisbane-based multinational resources group.

Figures for the year to July 3 showed that net profits, after taking into account foreign exchange gains and extraordinary items, had more than quadrupled to A\$172.9m (US\$140m) from A\$36.8m. On an equity-adjusted basis, profits were six times higher at A\$287.9m.

This was despite a mere 11 per cent increase in sales and other revenue to A\$1.61bn - reflecting the appreciation of the Australian dollar against the US dollar - and a slight increase in costs.

The results reflect the end of

a "six- to seven-year drought of low metal prices," MIM said yesterday. "But this is still not a satisfactory return on investment."

MIM's profit from its mining, smelting and refining operations, before tax and exchange gains, nevertheless showed a significant improvement to A\$182m from the previous year's A\$75m. After tax, the figure was A\$97.8m, up from A\$23m.

The group said copper and lead smelters at its principal Mount Isa mine produced at record rates during the year, while production and sales of zinc concentrate were second only to the previous year's record. Silver production was up 15 per cent, and gold made an earnings contribution with the opening of MIM's first Aus-

tralian mine, in Queensland.

Output of coal, however, was hurt by miners' industrial action and a cyclone. "This was the first full year in which the coal division sustained an operating loss - A\$66m - before income tax and foreign exchange provisions," the group said.

The figures showed foreign exchange gains amounted to A\$38.5m, up from A\$6.8m, but these were mainly non-cash and unrealised accounting provisions. Largely because of exchange rate variations, the group's total net indebtedness was reduced by A\$178m to an estimated A\$151m.

Separately, the group reported extraordinary gains of A\$58.6m, which compared with an A\$8.8m loss the previous year. This reflected an adjust-

ment made for the way a cut in Australian corporate tax from 49 per cent to 39 per cent affected the group's deferred income tax at the beginning of the 1987-88 year.

Shareholders' funds increased by A\$410m to around A\$1.6bn. There will be increased further as a result of the A\$403m being raised through a one-for-four rights issue announced last month.

MIM announced a 3 cents unfranked final dividend, making a total of 5 cents and entailing a payout of A\$49m compared with A\$32m in 1986-87. The share price finished 3 cents lower at A\$2.18 on profit-taking.

The 1987-88 figures are for a 52-week period, unlike last year's, which covered a longer, 54-week period.

## Venezuela returns with \$100m floater

By Our Euromarkets Staff

VENEZUELA launched its second Eurobond this year, tapping the market via Samuel Montagu with a \$100m five-year floating-rate note paying interest at 14 points over six-month London interbank offered rates.

While the bonds at the moment carry a lower rate than the fixed-rate 11 1/2 per cent financing arranged in February, the reduction in borrowing costs to Venezuela is more modest than the rates suggested. Today's financing had fees of 2 1/2 per cent while the earlier issue, led by J.P. Morgan Securities, had fees of 1 1/2 per cent.

According to Mr Oliver Parr, a director at Montagu, the higher fees reflect the fact that Venezuela wanted to keep the coupon at 1 1/2 per cent.

Unlike most other Latin American countries, Venezuela has restructured its commercial bank debts only once since 1982 and has been regarded as the most likely candidate to return to voluntary lending.

Mr Parr said that despite the country's recent economic woes, the bonds have been sold not only inside Venezuela but also to one or two international banks.

One of the buyers was the issue's co-manager, Deutsche Sudamerikanische Bank, a Hamburg-based subsidiary of Dresdner Bank. Deutsche-Sudamerikanische manages funds for so-called high net worth individuals in Latin America who are expected to buy the bonds.

Shortly after the mandate was awarded, Venezuela announced that in an effort to protect dwindling foreign exchange reserves, it would delay interest payments due on some domestic bonds and said that for the first time in about five years it would ask commercial bank creditors for fresh funds.

## Bond for Von Roll

VON ROLL, the Swiss industrial group, is to raise Sfr80m through the Zurich capital market. The 4 1/2 per cent, eight-year bond is priced at 100 1/2.

## Japanese borrowers again flood warrant issue sector

By Our Euromarkets Staff

A FRESH wave of equity warrant bonds for Japanese borrowers hit the international bond market yesterday, depressing prices slightly and calling into question a recent agreement to price securities to reflect the creditworthiness and profile of individual issuers.

Five four-year deals were launched with coupons ranging from 4 1/2 to 5 1/2 per cent, bringing the total of new issues over the past two trading days to \$1.2bn. Another \$200m issue is scheduled for tomorrow.

While virtually all the day's issues closed well inside their fees - meaning that co-managers are able to make a profit on the securities, traders said that lead managers were convinced by their own securities when asked to do so. This practice, part of a widely-accepted practice known as stabilising new issues, may obscure the true level of investor demand and may not offer guidance on the key question of whether coupons are high enough.

Shiseido Company, the Japanese cosmetics group, launched a \$200m bond with a coupon of 4 1/2 per cent, via Daiwa Europe. Despite wide name recognition and liquidity, the issue closed just inside its fees of 97 1/2.

Yamaichi International brought two other four-year issues, of \$100m each and carrying coupons of 4 1/2 per cent. The borrowers were Tokyo Tatemono, a real estate development company, and Iwami.

International, a producer of liquefied petroleum gas. Neither name is as widely known as Shiseido but both closed at better prices, at 98 1/2 and 98 respectively.

Two other deals of \$50m each were launched. Tokyo Kasei Company, a maker of equipment for aircraft and

## INTERNATIONAL BONDS

cars, and Kawashima Textile Manufacturers both four-year bonds with 5 1/2 per cent coupons via Nikko Securities and Nomura Securities respectively.

The two issues closed just outside their fees at 97, a small loss for co-managers.

Certainly, some dealers argue, the proverbial proof of the pudding is in the tasting, and investors, tasting the issues with 4 1/2 per cent coupons, have decided they are somewhat less well-known borrowers can achieve rates as low as 4 1/2 per cent, others are sure to follow. And if that happens, the market will be thrown back into disarray, they say.

The dollar survived yet another onslaught of coordinated intervention from central banks, including the US Federal Reserve. This pushed prices of domestic West German government bonds to close as much as 35 basis points lower in the long end.

Mark Eurobond activity was

mooted, with bonds losing a more modest 15 basis points on average.

The average yield on outstanding domestic bonds closed at 6.60 per cent, the highest level for German domestic bonds this year.

There were considerable expectations that the Bundesbank's key repurchase agreement rate may be raised today. There was further speculation that official interest rates could be raised after the Bundesbank Council meeting on Thursday.

In Canadian dollars, the State Bank of South Australia brought a C\$100m, three-year issue with a coupon of 10 1/2 per cent and a price of 101 1/2, yielding a spread over the Canada 9 per cent benchmark of 43 basis points. Chase Investment Bank is lead manager.

Meanwhile, dollar Eurobonds closed virtually unchanged although issues longer than seven years shed about 1/2 point in very lacklustre trading.

Dealers said that particularly tight spreads for Japanese borrowers in the secondary market relative to US government issues has encouraged several borrowers to discuss mandates.

Two large Japanese banks are expected to issue straight dollar debt later this week. In French francs, Commerciale Francaise issued a FF 500m four-year bond with a 9 per cent coupon and priced at 101 1/2, ended trading at a discount of 1 1/2.

## Amro offshoot buys Chemical Bank Asian unit

By Our Hong Kong Correspondent

PIERSON, Helderling and Pierson, the Dutch merchant banker, is to expand its private banking activities in the Far East with the acquisition of Chemical Bank's Asian private banking operations.

Under an agreement announced yesterday some 30 of Chemical Bank's staff in Hong Kong and Singapore will be transferred to Pierson, in a deal estimated to be worth around US\$5m.

Pierson is a wholly-owned subsidiary of Amro Bank of the Netherlands and is involved in portfolio management, securities and capital markets, and corporate finance.

It already manages portfolios for private clients and institutional investors from three principal offices in Amsterdam, Hong Kong and Philadelphia.

Chemical Bank, sixth largest in the US, announced earlier this year its desire to rationalise its international private banking operations and intends to concentrate upon the Latin American market.

## Publishers placing

Publishers Equipment of the US announced a private placement of \$80,000 common shares with Koenig & Bauer of West Germany valued at \$4.4m.

## Swire aircraft unit 37% ahead

By Michael Murray in Hong Kong

HONGKONG Aircraft Engineering Company (Haeo), the aircraft maintenance subsidiary of Swire Pacific, yesterday reported a 37 per cent increase in attributable profits to HK\$118.3m (US\$15m) for the six months ended June 30.

Turnover rose to HK\$489.2m, from a previous HK\$489.2m, and pre-tax profits climbed to HK\$136.7m from HK\$100.2m. The dividend is going up from 25.9 cents share to 33.3 cents.

Mr Peter Sutcliffe, Haeo's chairman, said the company's

aircraft maintenance facilities had been heavily utilised during the first half by both scheduled and non-scheduled customers, though the engine overhaul division was still working at below capacity.

Haeo benefited from additions to the fleet of Cathay Pacific Airways, also part of the Swire group, which required substantial pre-work on two additional TriStars it had acquired.

Substantial refurbishment work was carried out on 11

other Cathay Pacific aircraft.

During the first half, refurbishment work was also undertaken for British Airways, one of Haeo's biggest customers, including cabin refurbishments on four TriStars and the fitting out of one new Boeing 747.

During the second half, Haeo is scheduled to carry out overhauls on three DC-10 aircraft for British Airways, and the company's aircraft maintenance facilities are forecast to operate at full capacity for the rest of the year.

## Equiticorp wins approval for major reorganisation

By Our Financial Staff

EQUITICORP International is to press ahead with its wide-ranging reorganisation following regulatory approval from the UK, Hong Kong, Australian and New Zealand authorities.

The company, formed to draw together the various interests of Mr Alan Hawkins, the New Zealand financier, effectively moves the group's corporate registration from New Zealand to the UK.

The reorganisation was first announced in May. Mr Hawkins said then the changes were being made for tax reasons and to give Equiticorp access to wider capital markets.

Under the plan the company, which controls Guinness Peat Group, the London-based financial services organisation, will operate from Hong Kong with a regional base in Sydney but will be registered in the UK.

Approval had been received to list Equiticorp International on the New Zealand share market, but no date has been set. A listing is currently being sought in Australia.

After the restructuring Equiticorp International will have assets of A\$9.3bn (US\$3.17bn). Hawkins will own 99 per cent of the company.

## Singapore bank group shows profits growth

By Our Financial Staff

OVERSEAS Union Bank, the Singapore banking group, reports a near 13 per cent increase in group profits to S\$31m (US\$15m), after tax and diminution in value of assets, in the six months to June 1988 compared with a year earlier.

At the bank alone, after-tax earnings climbed 21 per cent to S\$22.1m. Group depreciation rose to S\$6.2m from S\$4.5m, while for the bank depreciation edged up to S\$5.5m from S\$4m.

OUB, which is the smallest of Singapore's big four banking groups, is to pay an interim dividend of 4 per cent, down 1 per cent from a year earlier.

## Reliance Petrochemicals launches issue

By R.C. Murthy in Bombay

RELIANCE Petrochemicals, an offshoot of Reliance Industries, has launched a Rs8m convertible debenture issue, the largest yet issued in India.

Half the Rs8m issue is offered to shareholders of the parent company on a preferential basis and the remainder to

the public. The debenture can be converted into equity in three phases, starting this year and running until 1993.

Reliance Industries is one of India's fastest growing companies. A Rs4.4bn convertible bond issued by the company in

1986 was more than three times subscribed.

Proceeds of the convertible debenture will help finance Rs7m worth of capital spending by Reliance Petrochemicals. It will be the first Indian project of its size not to depend on government-backed loans.

## FT GUIDE TO WORLD CURRENCIES

The table below gives the latest available rates of exchange (rounded) against four key currencies on Monday 22 August 1988. In some cases the rate is nominal. Market rates are the average of buying and selling rates except where they are shown to be otherwise. In some cases market rates have been calculated from those of foreign currencies to which they are tied.

COUNTRY	£ STG	US \$	D-MARK	YEN (x100)	COUNTRY	£ STG	US \$	D-MARK	YEN (x100)	COUNTRY	£ STG	US \$	D-MARK	YEN (x100)
Albania (Albania)	99.25	99.2007	30.8449	44.1601	Greenland (Danish Krone)	12.9925	7.3882	3.8226	5.4728	Peru (Int'l)	95.5700	33.1464	17.2711	24.7252
Algeria (Dinar)	10.78	6.4300	3.3504	4.7964	Guatemala (Quetzal)	1.00	2.7139	1.4141	2.0244	Philippines (Peso)	34.20	20.3996	10.4293	15.2149
Angola (Kwanza)	51.5170	30.7288	16.0114	22.9219	Haiti (Gourde)	506.10	301.8789	157.2660	225.1833	Pakistan (Rupee)	100.00	0.0064	0.0318	0.4449
Antigua (Antigua)	4.25	2.7139	1.4141	2.0244	Honduras (Lempira)	100.00	2.2074	1.2474	1.7474	Panama (Balboa)	100.00	0.0064	0.0318	0.4449
Argentina (Peso)	1.3889	1.3889	1.3889	1.3889	Hungary (Forint)	100.00	2.2074	1.2474	1.7474	Paraguay (Guarani)	100.00	0.0064	0.0318	0.4449
Aruba (Aruba)	3.02	1.9813	0.9286	1.3437	Indonesia (Rupiah)	100.00	0.0001	0.0001	0.0001	Poland (Zloty)	766.99	457.2561	226.2544	341.0856
Australia (Dollar)	2.4625	1.5211	0.7139	1.0422	Israel (Sheqel)	100.00	0.0001	0.0001	0.0001	Portugal (Escudo)	200.00	0.0064	0.0318	0.4449
Austria (Schilling)	22.615	13.4894	7.0287	10.0422	Italy (Lira)	100.00	0.0001	0.0001	0.0001	Romania (Leu)	100.00	0.0064	0.0318	0.4449
Azores (Port Escudo)	260.00	155.0499	80.8080	115.6840	Jamaica (Jamaican \$)	100.00	0.0001	0.0001	0.0001	Russia (Ruble)	100.00	0.0064	0.0318	0.4449
Bahamas (Bahama \$)	1.6765	1.6765	1.6765	1.6765	Kenya (Kenya Shilling)	100.00	0.0001	0.0001	0.0001	S. Africa (Rand)	100.00	0.0064	0.0318	0.4449
Bahrain (Bahraini \$)	0.4945	0.4945	0.4945	0.4945	Korea (Korean Won)	100.00	0.0001	0.0001	0.0001	Spain (Peseta)	100.00	0.0064	0.0318	0.4449
Belize (Belize \$)	2.0000	2.0000	2.0000	2.0000	Kuwait (Kuwaiti Dinar)	100.00	0.0001	0.0001	0.0001	Sweden (Krona)	100.00	0.0064	0.0318	0.4449
Bermuda (Bermudian \$)	1.6765	1.6765	1.6765	1.6765	Laos (Lao Kip)	100.00	0.0001	0.0001	0.0001	Switzerland (Franc)	100.00	0.0064	0.0318	0.4449
Bhutan (Bhutanese Ngultrum)	1.0000	1.0000	1.0000	1.0000	Lebanon (Lebanese Lira)	100.00	0.0001	0.0001	0.0001	Taiwan (New Taiwan \$)	100.00	0.0064	0.0318	0.4449
Bolivia (Boliviano)	4.25	2.7139	1.4141	2.0244	Libya (Libyan Dinar)	100.00	0.0001	0.0001	0.0001	Thailand (Baht)	100.00	0.0064	0.0318	0.4449
Bosnia (Bosnian Mark)	1.0000	1.0000	1.0000	1.0000	Lithuania (Lithuanian Litas)	100.00	0.0001	0.0001	0.0001	Togo (CFA Franc)	100.00	0.0064	0.0318	0.4449
Brazil (Brazilian Real)	459.70	274.3632	142.9588	204.5505	Luxembourg (Luxembourg Franc)	100.00	0.0001	0.0001	0.0001	Tonga (Tonga Pa'anga)	100.00	0.0064	0.0318	0.4449
British Virgin Is (US \$)	1.6765	1.6765	1.6765	1.6765	Macao (Macaese Pataca)	100.00	0.0001	0.0001	0.0001	Turkey (Lira)	100.00	0.0064	0.0318	0.4449
Bruni (Brunei Dollar)	1.6765	1.6765	1.6765	1.6765	Malaysia (Malaysian Ringgit)	100.00	0.0001	0.0001	0.0001	Uganda (Shilling)	100.00	0.0064	0.0318	0.4449
Bulgaria (Bulgarian Lev)	1.6765	1.6765	1.6765	1.6765	Maldives (Maldivian Rufiyaa)	100.00	0.0001	0.0001	0.0001	United States (Dollar)	100.00	0.0064	0.0318	0.4449
Burkina Faso (CFA Franc)	1.6765	1.6765	1.6765	1.6765	Mali (Mali Franc)	100.00	0.0001	0.0001	0.0001	Uruguay (Peso)	100.00	0.0064	0.0318	0.4449
Burundi (Burundi Franc)	1.6765	1.6765	1.6765	1.6765	Mexico (Mexican Peso)	100.00	0.0001	0.0001	0.0001	Venezuela (Bolívar)	100.00	0.0064	0.0318	0.4449
Cameroon (CFA Franc)	1.6765	1.6765	1.6765	1.6765	Moldova (Moldovan Leu)	100.00	0.0001	0.0001	0.0001					
Canada (Canadian Dollar)	0.7000	0.7000	0.7000	0.7000	Monrovia (Liberian Dollar)	100.00	0.0001	0.0001	0.0001					
Cape Verde (Cape Verde Escudo)	200.00	127.3516	65.5455	93.7041	Morocco (Moroccan Dirham)	100.00	0.0001	0.0001	0.0001					
Cayman Is (Cayman Dollar)	1.0000	1.0000	1.0000	1.0000	Mozambique (Mozambique Escudo)	100.00	0.0001	0.0001	0.0001					
Chad (CFA Franc)	1.6765	1.6765	1.6765	1.6765	Namibia (Namibian Dollar)	100.00	0.0001	0.0001	0.0001					
Chile (Chilean Peso)	413.31	246.514	128.2548	183.8776	Nepal (Nepalese Rupee)	100.00	0.0001	0.0001	0.0001					
China (Renminbi Yuan)	6.2900	3.7541	1.9651	2.8004	Netherlands (Guilder)	100.00	0.0001	0.0001	0.0001					
Colombia (Colombian Peso)	317.80	189.8577	104.9324	150.3693	Nicaragua (Nicaraguan Cordoba)	100.00	0.0001	0.0001	0.0001					
Comoros (Comorian Franc)	1.6765	1.6765	1.6765	1.6765	Niger (Niger Franc)	100.00	0.0001	0.0001	0.0001					
Congo (Congo Franc)	1.6765	1.6765	1.6765	1.6765	Nigeria (Nigerian Naira)	100.00	0.0001	0.0001	0.0001					
Costa Rica (Costa Rican Colon)	100.00	17.7772	9.0414	13.4749	North Macedonia (Macedonian Denar)	100.00	0.0001	0.0001	0.0001					
Cuba (Cuban Peso)	0.0001	0.0001	0.0001	0.0001	Norway (Norwegian Krone)	100.00	0.0001	0.0001	0.0001					
Czechoslovakia (Czech Koruna)	9.3000	5.5472	2.8904	4.1379	Oman (Omani Rial)	100.00	0.0001	0.0001	0.0001					
Denmark (Danish Krone)	12.9925	7.3882	3.8226	5.4728	Pakistan (Pakistani Rupee)	100.00	0.0001	0.0001	0.0001					</







## UK COMPANY NEWS

## Woodchester vaults to I£7.65m

By Clare Pearson

ACQUISITIONS helped Woodchester Investments, Irish-based finance and leasing subsidiary of British & Commonwealth Holdings, increase pre-tax profits to I£7.65m (€6.38m) in the six months to the end of June.

Woodchester, which has changed its year-end, reported taxable profits of I£3.53m in the full 12 months to March 31 1987.

The results this time were swelled by the inclusion of Bomaker Bank, the Irish consumer credit concern acquired in April 1987, and insurance broker Savings & Investments, which made a contribution from January this year.

Woodchester's acquisition trail continued this year with the I£26.6m purchase in March of the 70 per cent it did not already own of Moorgate Mer-

cantile Holdings, UK credit finance and leasing group, and earlier this month, the I£1.7m purchase of Trinity Bank, Dublin, from Brown Shipley.

Earnings per share rose 21 per cent to 4.84p (4p). The Moorgate purchase, which was designed to provide a springboard for Woodchester's expansion in the UK, had a neutral effect on earnings growth, said Mr David Dilger, finance director.

The immediate effect of the purchase was to allow Woodchester to take advantage of its 29.9 per cent holding in Lookers, the north of England-based car distributor on whose finance business Woodchester has the right of first refusal. It has been operating a new Lookers Finance division for the last two months.

Gross rentals soared to

£66.78m (£24.32m). Tax took £2m (£502,000). The interim dividend is raised to 75p, which compares with 60p for the six months to end-September last year.

Mr Dilger said that Woodchester, which currently has borrowings of about £200m against shareholders' funds of £50m, was continuing to look out for acquisitions.

## COMMENT

Woodchester has an excellent track record in buying companies at reasonable prices, centralising their managements and generally stripping out costs. These figures were different only in so far as it had bought Moorgate, already a tight ship, at what it admitted was a full price for the longer-term benefits of expanding and diversifying in the UK -

which it must do, since its core leasing business in the Irish Republic is now mature. So far, Moorgate is going according to plan, with demand for small business finance and instalment credit strong and the Lookers finance division already in place. Shannon International, the fastest growing business, also boosted its contribution substantially. The results, which showed the company on stream to make £1.52m in the current year, were in short entirely pleasing. But analysts still consider the shares fully-valued at current prices, even taking into account the technical reason for the prospective p/e of about 18.5 being more than double comparable UK stocks - which is the importance of the shares within the Irish stock market.

## Rockwood surges to £1.1m in first half

By Andrew Hill

ROCKWOOD HOLDINGS, the rapidly expanding USM-quoted distribution and related services group, yesterday reported more than trebled interim profits and a 63 per cent jump in earnings per share.

A good all-round performance was reflected in pre-tax profits up from £306,000 to £1.11m for the first half of 1988, on a turnover of £26.9m, against £25.6m.

Earnings per 10p share increased from 1.89p to 3.24p and there is an interim dividend of 0.3p - the first under current management. Last year's single payment was 0.4p.

In June, the group paid nearly £2m for Walcott Meadows and its results are included for one month. Other June acquisitions were Brookside International Group and its associate Leasing Principals, a vehicle leasing company which is expected to record its first profit this year.

Mr Tom Forrest, chairman, said that existing contracted income which took the group through the second half of the year and beyond should enable it to continue the considerably improved performance.

Last month, Rockwood completed the £3.55m sale of HB Electronics to Electron House.

## Wace expands with £1.94m purchase

By Andrew Hill

Wace Group, the pre-press services group, has bought Unsworth Sugden Advertising for a maximum of about £1.94m in cash and shares.

The group is paying an initial £1.34m in cash and shares for the company, its subsidiaries and premises. A further payment of up to £700,000 is linked to Unsworth Sugden's performance until December 1989.

Unsworth Sugden is a marketing services company based in Leicester and Bristol, and will operate within Wace Group's marketing services division, which is centred on Emery McLaven Orr.

In the year to August 31 1987, Unsworth Sugden made £125,913 before tax on turnover of £3m. Its net assets at that date were £111,981. The company has guaranteed pre-tax profits for the year to August 31 1988, of not less than £150,000.

## Pleasurama

Pleasurama's £63m bid for Hard Rock International yesterday went unconditional as to acceptances. Shareholders speaking for 91.38 per cent of Hard Rock's equity have accepted the offer.

## Directors on March

Two directors of March, the racing cars and engineering group which joined the Unlisted Securities Market in April last year, have resigned following a recent major shake-up in management.

Mr C.D. Towns, the joint managing director and Mr L. Shackleton-Fergus have left the board and Mr Towns has also sold his 183,667 shares at 80p a share.

## Manufacturing side lifts Alida to £2.35m midterm

By Andrew Hill

ALIDA HOLDINGS, packaging manufacturer and distributor, increased pre-tax profits by 16 per cent in the six months to June 30, despite a disappointing performance from the distribution side.

Turnover advanced 37 per cent from £22.5m to £30.8m, pre-tax profit from £2.02m to £2.35m, and earnings per share from 11.7p to 18.8p. The interim dividend is up from 2.5p to 3p.

Mr Rex Stone, chairman, said the cost of raw materials had risen but most of the impact had been passed on to customers in increased selling prices. He said lack of materials might limit Alida's volume growth in the second half, but the group was better placed than many of its competitors

to cope with the situation. Alida is proposing to increase its authorised capital from £2m to £13m with the creation of 9m £1 cumulative redeemable preference shares 2008/2013.

The company has decided £12m is needed to strengthen its UK manufacturing and distribution base in preparation for the creation of a single European market in 1992.

It intends to place 5m preference shares to help fund an accelerated investment programme, although the terms of the placing are yet to be decided.

During the first half of 1988, manufacturing pre-tax profits rose 43 per cent to £1.74m (£1.22m) on sales of £18.8m

(£13.3m), but distribution profits dropped 16 per cent to £769,000 (£501,000) on turnover of £12m (£8.57m).

Mr Stone said difficulties had arisen in the co-ordination of a number of small packaging distribution subsidiaries. However, he said the polymer distribution arm - where turnover increased by 92 per cent in the first half - would continue to grow, while problems with the packaging distribution side were addressed.

Singer & Friedlander Group, the investment and property dealing company, holds a 17 per cent stake in Alida. Main board directors and subsidiary company directors together hold over 50 per cent of the company's shares.

## J Fisher up 10% at £1.6m

By Peter Pearson

JAMES FISHER & Sons, shipowner, port operator, insurance broker, ship manager and stevedores, increased pre-tax profits by 10 per cent from £1.42m to £1.56m in the first half of 1988. This result was achieved on turnover which slipped from £15.47m to £15.15m.

The tax charge was slightly up at £551,000. An extraordinary credit of £4.85m (debit £4,500), related to the disposal in May of three freight port interests - in Gravesend and Sittoung, Kent, and Ellesmere Port, Cheshire. Earnings worked through at 4.22p (3.77p) per share and an interim divi-

dend of 1.86p (1.7p) has been declared.

The directors said that profitability of both the port and shipping interests was affected by international markets and that it was therefore difficult to make any forecast of future profitability. However, taking into account the broad base of the company's shipping interests and the recent reorganisation of its port operations, the directors were confident of a satisfactory result for the year.

The group's shipping interests performed well and benefited from the improvement in the shipping market which started towards the end of last year. However, fierce competition in the port industry restrained further growth in the group's ports, which failed to meet expectations.

## New Throgmorton plan will raise £22m

By Nikki Tait

NEW THROGMORTON Trust, the split level investment trust specialising in recovery situations, is gearing up via an innovative issue of zero coupon debenture stock and by the drawdown of a 10-year fixed loan facility.

Together, the two measures will raise about £22m for the trust, which has assets of some £55m. Yesterday, New Throgmorton said that it saw many investment opportunities in the current market conditions. In theory, its split level

structure - separate classes of income and capital shares - could pose problems for any attempt to gear up. These would occur if either type of shareholder was disadvantaged as a result of the gearing move.

For that reason, investment house Barclays de Zoete Wedd has devised the twin fund-raising structure, and - on the way - introduced the first secured zero coupon stock to the London market. A handful of unsecured domestic zero

coupon stocks currently trade.

New Throgmorton's zero coupon stock, which is underwritten by BZW, raises around £7.5m. It was placed yesterday at £23.977 per £100 nominal of stock. At this price, the gross redemption yield of the stock, which matures on August 24 1998, is 11.407 per cent. This is equivalent to the gross redemption yield on 9 per cent Exchequer stock 1998 plus a margin of 1.4 per cent.

The stock is secured by a floating charge and ranks

behind the existing 12.6 per cent debenture stock 2008.

The bank loan from Barclays matures at the same time as the zero coupon stock. The facility is for up to £14.5m and is available for drawdown at one day's notice until September 30. Interest on the loan will be charged at an annual rate equivalent to the average gross redemption yield on 9 per cent Exchequer stock 1998 on the date of drawdown plus a margin of 1.2 per cent.

## Dee sees no need for board replacements

By Nikki Tait

DEE CORPORATION, the UK food retailer which earlier this year rebuffed a £20m bid from Barker & Dobson, says that it sees no immediate need for boardroom replacements.

Since the start of 1988, there have been three board departures. Mr Kevin O'Keefe retired early for health reasons, Mr Tony Bulter left to run Ashley Industrial Trust - and subsequently acquired Dee's Spanish subsidiary,

Diga - and Mr Peter Thistlethorn stepped down from the main board, although he remains managing director of operations for Gateway.

In addition, there has been speculation over Mr David Fisher's continued willingness to remain with the group as marketing director. However, no announcement has been made in Mr Fisher's case and the company declines to comment further.

Nevertheless, in Dee's annual report, Mr Mac Monk, chairman, says that "the simplified structure of the group does not require immediate board replacements".

On the trading front, Mr Monk predicts "further progress" for the Gateway grocery chain in the current year and a stronger first half for the group overall. With regard to Herman's, Dee's ailing US subsidiary, he says it would be

"imprudent to predict full recovery immediately" but expects an improvement in the current trading period.

Last year, Mr Monk's remuneration, excluding pension contributions, rose from £181,494 to £220,000.

At rival food retailer, Argill Group, Mr Monk's counterpart - Mr Alistair Grant - sees an increase from £252,000 to £279,000.

## Bristol Water raising £12m via issues

By Andrew Hill

BRISTOL WATERWORKS Company yesterday announced an issue of ordinary stock to raise up to £8m.

Following a legal precedent set earlier this year, the statutory water company has applied conditions to the offer for sale by tender, which will prevent investors acquiring more than 30 per cent of the company's nominal voting rights. New investors will be unable to build up a stake of more than 15 per cent.

A further £5m is to be raised through an issue of convertible redeemable preference shares.

Two large French water suppliers - Compagnie Generale

des Eaux and Lyonnaise des Eaux - hold respectively 28.7 and 25.2 per cent of Bristol's voting stock, although their influence is severely restricted by the company's statutes. Their stakes are likely to be slightly diluted by the offer.

Tenders are being invited for £1.55m of 4.9 per cent stock at a minimum price of £285 per £100 nominal, compared with £825 when the existing ordinary stock was last dealt, and a high of £700.

The conditions are identical to those imposed by Mid Kent Water Company for an offer of ordinary stock made in June.

Morgan Grenfell, the mer-

chant bank, which held about 53 per cent of Mid Kent's voting capital, challenged the restrictions in the High Court and the Court of Appeal. The conditions were upheld and Morgan Grenfell's holding was substantially diluted. As a result of the offer, Generale des Eaux built up a stake of about 15 per cent in Mid Kent.

Local consumers, employees and smaller subscribers are being given priority in applying for the preference shares, redeemable in 1998. The minimum investment is 250 shares at £1 each.

The preference shares carry a 6 per cent dividend and are

convertible into ordinary stock at a rate of £100 nominal stock for every 500 preference shares between 1989 and 1994.

Earlier this year, Lyonnaise gained control of East Anglian Water Company, when it launched an agreed bid from the platform of a large shareholding picked up through an unrestricted tender offer.

Seymour Pierce Butterfield - broker to the Bristol, Mid Kent and East Anglian offers - and Brown Shipley, the merchant bank, received different legal advice for the Mid Kent offer and decided to impose conditions restricting large investors' stakes.

## COMPANY NEWS IN BRIEF

**ECONOMIC FORESTRY** Group has acquired Nutscene, a private company engaged in the manufacture and distribution of garden products, for a total of \$600,000 cash. Nutscene made pre-tax profits of £108,000 from turnover of £510,000 in the year to December 31 1987.

**FINE ART DEVELOPMENTS**, which manufactures and sells greeting cards and associated products, has acquired the Calder Book Company, book wholesaler and merchandiser, for an initial consideration of £250,000. A further profit-related payment is payable based

on results for the two years to December 31 1990. **GNOME PHOTOGRAPHIC** is to change its name to Noble Raredon, subject to a resolution at the forthcoming AGM. **PRESSAC HOLDINGS**, UK electronic components supplier, has announced further

development in the US through its Detroit-based subsidiary Pressac Inc, which has opened a new purpose-built warehouse in Huntsville, Alabama. The warehouse will supply UK-manufactured automotive circuits to Chrysler at its Huntsville Electronic City complex.

## SHARE STAKES

The following changes in share stakes were announced recently: **ABBOTT MEAD** Vickers: London Uberior (LAS Group) Nominees, part of London & Scottish Insurance, holds 706,800 shares (5.3 per cent). **BALTIC**: Funds managed by

Scottish Amicable Investment Managers hold 3m ordinary (8.5 per cent). **BENLOX HOLDINGS**: Dr Ashraf Marwan said he is the beneficial owner of 3.68m shares. **BRIDPORT-GUNDRY**: Charterhall lifted holding to 2.4m shares (24.01 per cent).

**COMMERCIAL UNION**: GA Duncan Pty holds 400,000 and Ollies Investment 29.1m shares. Total holding of 29.5m represents 1 per cent of capital. **F & C ENTERPRISE** Trust: Equitable Life Assurance acquired 250,000 and holds 9.66m shares (11.09 per cent). **F AND C EUROTRUST**: Civil Aviation Authority Superannuation acquired 100,000 ordinary and holds 940,498 (7.5 per cent). **FRILAY PACKAGING**: Framlington Extra Income Trust owns 450,000 ordinary (5.24 per cent). **FIRSTLAND OIL** and Gas:

owns 915,000 shares (5.64 per cent). **EVE GROUP**: Mrs B.N. Ledger holds 48,060 ordinary (5.3 per cent). **GUINNESS**: LVMH Moët Hennessy Louis Vuitton SA has an aggregate holding of 104,28m shares (11.46 per cent). **HUNTERPRINT**: Prudential Corporation group, together with segregated funds managed on behalf of clients, holds 971,079 ordinary (5.03 per cent). **OFFICE AND Electronic Machines**: Norwich Union Life Insurance increased holding to 319,284 shares (5.21 per cent).

Holding of Amalgamated Financial Investments reduced from 1m to 800,000 shares (4.78 per cent). **GUINNESS**: LVMH Moët Hennessy Louis Vuitton SA has an aggregate holding of 104,28m shares (11.46 per cent). **HUNTERPRINT**: Prudential Corporation group, together with segregated funds managed on behalf of clients, holds 971,079 ordinary (5.03 per cent). **OFFICE AND Electronic Machines**: Norwich Union Life Insurance increased holding to 319,284 shares (5.21 per cent).



Leveraged Capital Holdings N.V.

The Quarterly Report as of 30th June 1988 has been published and may be obtained from:

Pierson, Holding & Pierson NV, Herengracht 214, 1016 BS Amsterdam. Tel. +31-20-211188



Tokyo Pacific Holdings N.V.

Tokyo Pacific Holdings (Seaboard) N.V.

The Quarterly Report as of 30th June 1988 has been published and may be obtained from:

Pierson, Holding & Pierson NV, Herengracht 214, 1016 BS Amsterdam

National Westminster Bank PLC Stock Office Services, 3rd Floor, 20 Old Broad Street, London EC2N 1EJ

NM Rothschild & Sons Limited, New Court, St. Swithin's Lane, London EC4P 4DU

1 Europenne de Banque, 31 Rue Leffine, Paris 9

Triplax & Burkhardt, Königsgasse 21-23, D 4000, Düsseldorf 1

Sal. Oppenheim jr. & Cie, Unter Sachsenhausen 4, D 5000, Köln 1

Banque Paribas Belgique S.A., Boulevard Emile Jacqmain 162, B 1000, Bruxelles

Banque Paribas, 3 Rue d'Anin, Paris 2

Banque Paribas (Luxembourg) S.A., 10a Boulevard Royal, Luxembourg

Merrill Lynch International & Co., all European Offices

Rothschild Australia Limited, Royal Exchange Building, 56 Pitt Street, Sydney N.S.W. 2000



**DRESDNER BANK A.G.**  
LONDON BRANCH  
CHANGE OF ADDRESS

## OUR NEW ADDRESS IS

**DRESDNER BANK HOUSE**  
125 WOOD STREET  
LONDON EC2V 7AQ  
TELEPHONE: 01-606 7030  
CABLES: DRESBAN  
TELEX: 885540  
FAX NO: 01-600 6310

**NOTICE TO WARRANTHOLDERS OF TOWA REAL ESTATE DEVELOPMENT CO., LTD.**  
US\$40,000,000  
3 1/2 per cent, Convertible Bonds with Warrants

Pursuant to Chapter 3 and 4 of the Instrument dated 2nd December, 1986, notice is hereby given as follows:

1. On 3rd August, 1988, the Board of Directors of TOWA REAL ESTATE DEVELOPMENT CO., LTD. (the "Company") resolved to make a final distribution of Shares of Common Stock of the Company to be made on 10th November, 1988, to its shareholders of record as of 30th September, 1988, at the rate of 0.1 new share for one share so recorded.

2. Such a true distribution will result in an adjustment of the subscription price of the Warrants as follows:

Subscription price before adjustment: Yen 733  
Subscription price after adjustment: Yen 666.40

The new subscription price will become effective on 1st October, 1988, Tokyo time.

The Total Bank, Limited  
London Branch  
Principal Paying Agent 23rd August, 1988

This notice is issued in compliance with the requirements of the Council of the International Stock Exchange of the United Kingdom and the Republic of Ireland Limited

**THE NEW THROGMORTON TRUST (1983) PLC**  
(Registered in England No. 1689298)

Placing by Barclays de Zoete Wedd Limited of  
**£22,500,000 Nominal of Zero Coupon Debenture Stock 1998**  
at £23.977 per £100 nominal payable in full on acceptance.

Application has been made to the Council of The Stock Exchange for the whole of the above stock ("the Stock") to be admitted to the Official List.

In accordance with the requirements of the Council of The Stock Exchange, two market makers will be offered participation in the marketing of the Stock.

Listing particulars relating to the Stock are available in the statistical services of Extel Financial Limited. Copies of the listing particulars may be obtained during normal business hours on any weekday, Saturdays and public holidays excepted, until 25th August, 1988 from the Company Announcement Office of The Stock Exchange 46 Finsbury Square London EC2A 1DD (for collection only) and up to and including 2nd September, 1988 from:

The New Throgmorton Trust (1983) PLC  
Royal London House  
22-25 Finsbury Square  
London EC2A 1DS

de Zoete & Bevan Limited  
Ebbgate House  
2 Swan Lane  
London EC4R 3TS

23rd August, 1988











هذه امة الأصل

Continued on next page



[illegible]

مجلسه اول



## LONDON SHARE SERVICE

[illegible]



## LONDON SHARE SERVICE

**AMERICANS—Contd**

1988			Price	+ or -	Div	Ctr	Yr
High	Low	Stock	\$		\$		Gr
28 1/2	19 1/8	Texasco \$6.25	27 1/2	+	\$3.00		6
60 1/4	43 1/4	Time Inc. S.	56 1/4	+	\$1.00		1
20 1/2	15 1/4	Transamerica S.	19 1/4	+	\$1.84		5
20 1/8	12 1/4	TRINGVA Corp	15 1/4	+	64c		2
23 1/2	17 1/4	USA S.	16 1/4	+	\$1.29		4
33 1/2	26 1/4	Unit. Technologies	32 1/2	+	\$1.60		4
31 1/2	26 1/4	US West	29 1/2	+	\$3.52		6
36 1/2	28 1/4	Wm. Management S.	28 1/2	+	\$2.50		4
32 1/2	12 1/4	Whirlpool S.	15 1/4	+	\$1.10		4
36 1/2	18 1/4	Worlwide S.	20 1/2	+	\$1.40		3

## CANADIANS

[illegible]

## BANKS, HP & LEASING

[illegible]

## BEERS, WINES & SPIRITS

[illegible]

## BUILDING, TIMBER, ROADS

100	131AMC 50c	185	113.0	2.7	4.4	10.8
105	101Die 6c, DC CV P.	185	65.0	1.0	1.0	1.0
110	102Die 6c, DC CV P.	185	65.0	1.0	1.0	1.0
115	103Amelia Sc 10c	45.5	12.0	1.1	1.1	1.1
120	104Amelia Sc 10c	45.5	12.0	1.1	1.1	1.1
125	105Amelia Sc 10c	45.5	12.0	1.1	1.1	1.1
130	111Arthur Shaw 10c	119	1.0	1.0	1.0	1.0
135	112Arthur Shaw 10c	119	1.0	1.0	1.0	1.0
140	113Arthur Shaw 10c	119	1.0	1.0	1.0	1.0
145	114Arthur Shaw 10c	119	1.0	1.0	1.0	1.0
150	127Azmow Sc 10c	4	10.0	1.0	1.0	1.0
155	128Azmow Sc 10c	4	10.0	1.0	1.0	1.0
160	240B-PB 10c	3	3.0	1.0	1.0	1.0
165	240B-PB 10c	3	3.0	1.0	1.0	1.0
170	240B-PB 10c	3	3.0	1.0	1.0	1.0
175	240B-PB 10c	3	3.0	1.0	1.0	1.0
180	78Bridson 10c	144	12.0	1.0	1.0	1.0
185	78Bridson 10c	144	12.0	1.0	1.0	1.0
190	170Garrett Dev. 10c	1	1.0	1.0	1.0	1.0
195	170Garrett Dev. 10c	1	1.0	1.0	1.0	1.0
200	85B-Hilwich 10c	4	1.0	1.0	1.0	1.0
205	85B-Hilwich 10c	4	1.0	1.0	1.0	1.0
210	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
215	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
220	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
225	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
230	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
235	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
240	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
245	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
250	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
255	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
260	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
265	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
270	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
275	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
280	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
285	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
290	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
295	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
300	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
305	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
310	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
315	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
320	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
325	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
330	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
335	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
340	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
345	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
350	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
355	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
360	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
365	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
370	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
375	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
380	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
385	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
390	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
395	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0
400	240B-Hilwich 10c	3	3.0	1.0	1.0	1.0

## BUILDING, TIMBER, ROADS

[illegible]

## CHEMICALS, PLASTICS

[illegible]

## DRAPERY AND STORES

337	Alewife 100	374	-5	8.0	3.8	2.8	12
338	216 Miller Day 2 P...	375	-1	7.9	3.8	2.8	12
339	216 Miller Day 2 P...	376	-1	7.9	3.8	2.8	12
340	67 On 'A' Ship 50	377	0	8.0	3.8	2.8	12
341	Ship's Counsel 50	378	0	8.0	3.8	2.8	12
342	330 Astin Reed	379	0	8.0	3.8	2.8	12
343	330 Astin Reed	380	0	8.0	3.8	2.8	12
344	330 Astin Reed	381	0	8.0	3.8	2.8	12
345	330 Astin Reed	382	0	8.0	3.8	2.8	12
346	330 Astin Reed	383	0	8.0	3.8	2.8	12
347	330 Astin Reed	384	0	8.0	3.8	2.8	12
348	330 Astin Reed	385	0	8.0	3.8	2.8	12
349	330 Astin Reed	386	0	8.0	3.8	2.8	12
350	330 Astin Reed	387	0	8.0	3.8	2.8	12
351	330 Astin Reed	388	0	8.0	3.8	2.8	12
352	330 Astin Reed	389	0	8.0	3.8	2.8	12
353	330 Astin Reed	390	0	8.0	3.8	2.8	12
354	330 Astin Reed	391	0	8.0	3.8	2.8	12
355	330 Astin Reed	392	0	8.0	3.8	2.8	12
356	330 Astin Reed	393	0	8.0	3.8	2.8	12
357	330 Astin Reed	394	0	8.0	3.8	2.8	12
358	330 Astin Reed	395	0	8.0	3.8	2.8	12
359	330 Astin Reed	396	0	8.0	3.8	2.8	12
360	330 Astin Reed	397	0	8.0	3.8	2.8	12
361	330 Astin Reed	398	0	8.0	3.8	2.8	12
362	330 Astin Reed	399	0	8.0	3.8	2.8	12
363	330 Astin Reed	400	0	8.0	3.8	2.8	12
364	330 Astin Reed	401	0	8.0	3.8	2.8	12
365	330 Astin Reed	402	0	8.0	3.8	2.8	12
366	330 Astin Reed	403	0	8.0	3.8	2.8	12
367	330 Astin Reed	404	0	8.0	3.8	2.8	12
368	330 Astin Reed	405	0	8.0	3.8	2.8	12
369	330 Astin Reed	406	0	8.0	3.8	2.8	12
370	330 Astin Reed	407	0	8.0	3.8	2.8	12
371	330 Astin Reed	408	0	8.0	3.8	2.8	12
372	330 Astin Reed	409	0	8.0	3.8	2.8	12
373	330 Astin Reed	410	0	8.0	3.8	2.8	12
374	330 Astin Reed	411	0	8.0	3.8	2.8	12
375	330 Astin Reed	412	0	8.0	3.8	2.8	12
376	330 Astin Reed	413	0	8.0	3.8	2.8	12
377	330 Astin Reed	414	0	8.0	3.8	2.8	12
378	330 Astin Reed	415	0	8.0	3.8	2.8	12
379	330 Astin Reed	416	0	8.0	3.8	2.8	12
380	330 Astin Reed	417	0	8.0	3.8	2.8	12
381	330 Astin Reed	418	0	8.0	3.8	2.8	12
382	330 Astin Reed	419	0	8.0	3.8	2.8	12
383	330 Astin Reed	420	0	8.0	3.8	2.8	12
384	330 Astin Reed	421	0	8.0	3.8	2.8	12
385	330 Astin Reed	422	0	8.0	3.8	2.8	12
386	330 Astin Reed	423	0	8.0	3.8	2.8	12
387	330 Astin Reed	424	0	8.0	3.8	2.8	12
388	330 Astin Reed	425	0	8.0	3.8	2.8	12
389	330 Astin Reed	426	0	8.0	3.8	2.8	12
390	330 Astin Reed	427	0	8.0	3.8	2.8	12
391	330 Astin Reed	428	0	8.0	3.8	2.8	12
392	330 Astin Reed	429	0	8.0	3.8	2.8	12
393	330 Astin Reed	430	0	8.0	3.8	2.8	12
394	330 Astin Reed	431	0	8.0	3.8	2.8	12
395	330 Astin Reed	432	0	8.0	3.8	2.8	12
396	330 Astin Reed	433	0	8.0	3.8	2.8	12
397	330 Astin Reed	434	0	8.0	3.8	2.8	12
398	330 Astin Reed	435	0	8.0	3.8	2.8	12
399	330 Astin Reed	436	0	8.0	3.8	2.8	12
400	330 Astin Reed	437	0	8.0	3.8	2.8	12
401	330 Astin Reed	438	0	8.0	3.8	2.8	12
402	330 Astin Reed	439	0	8.0	3.8	2.8	12
403	330 Astin Reed	440	0	8.0	3.8	2.8	12
404	330 Astin Reed	441	0	8.0	3.8	2.8	12
405	330 Astin Reed	442	0	8.0	3.8	2.8	12
406	330 Astin Reed	443	0	8.0	3.8	2.8	12
407	330 Astin Reed	444	0	8.0	3.8	2.8	12
408	330 Astin Reed	445	0	8.0	3.8	2.8	12
409	330 Astin Reed	446	0	8.0	3.8	2.8	12
410	330 Astin Reed	447	0	8.0	3.8	2.8	12
411	330 Astin Reed	448	0	8.0	3.8	2.8	12
412	330 Astin Reed	449	0	8.0	3.8	2.8	12
413	330 Astin Reed	450	0	8.0	3.8	2.8	12
414	330 Astin Reed	451	0	8.0	3.8	2.8	12
415	330 Astin Reed	452	0	8.0	3.8	2.8	12
416	330 Astin Reed	453	0	8.0	3.8	2.8	12
417	330 Astin Reed	454	0	8.0	3.8	2.8	12
418	330 Astin Reed	455	0	8.0	3.8	2.8	12
419	330 Astin Reed	456	0	8.0	3.8	2.8	12
420	330 Astin Reed	457	0	8.0	3.8	2.8	12
421	330 Astin Reed	458	0	8.0	3.8	2.8	12
422	330 Astin Reed	459	0	8.0	3.8	2.8	12
423	330 Astin Reed	460	0	8.0	3.8	2.8	12
424	330 Astin Reed	461	0	8.0	3.8	2.8	12
425	330 Astin Reed	462	0	8.0	3.8	2.8	12
426	330 Astin Reed	463	0	8.0	3.8	2.8	12
427	330 Astin Reed	464	0	8.0	3.8	2.8	12
428	330 Astin Reed	465	0	8.0	3.8	2.8	12
429	330 Astin Reed	466	0	8.0	3.8	2.8	12
430	330 Astin Reed	467	0	8.0	3.8	2.8	12
431	330 Astin Reed	468	0	8.0	3.8	2.8	12
432	330 Astin Reed	469	0	8.0	3.8	2.8	12
433	330 Astin Reed	470	0	8.0	3.8	2.8	12
434	330 Astin Reed	471	0	8.0	3.8	2.8	12
435	330 Astin Reed	472	0	8.0	3.8	2.8	12
436	330 Astin Reed	473	0	8.0	3.8	2.8	12
437	330 Astin Reed	474	0	8.0	3.8	2.8	12
438	330 Astin Reed	475	0	8.0	3.8	2.8	12
439	330 Astin Reed	476	0	8.0	3.8	2.8	12
440	330 Astin Reed	477	0	8.0	3.8	2.8	12
441	330 Astin Reed	478	0	8.0	3.8	2.8	12
442	330 Astin Reed	479	0	8.0	3.8	2.8	12
443	330 Astin Reed	480	0	8.0	3.8	2.8	12
444	330 Astin Reed	481	0	8.0	3.8	2.8	12
445	330 Astin Reed	482	0	8.0	3.8	2.8	12
446	330 Astin Reed	483	0	8.0	3.8	2.8	12
447	330 Astin Reed	484	0	8.0	3.8	2.8	12
448	330 Astin Reed	485	0	8.0	3.8	2.8	12
449	330 Astin Reed	486	0	8.0	3.8	2.8	12
450	330 Astin Reed	487	0	8.0	3.8	2.8	12
451	330 Astin Reed	488	0	8.0	3.8	2.8	12
452	330 Astin Reed	489	0	8.0	3.8	2.8	12
453	330 Astin Reed	490	0	8.0	3.8	2.8	12
454	330 Astin Reed	491	0	8.0	3.8	2.8	12
455	330 Astin Reed	492	0	8.0	3.8	2.8	12
456	330 Astin Reed	493	0	8.0	3.8	2.8	12
457	330 Astin Reed	494	0	8.0	3.8	2.8	12
458	330 Astin Reed	495	0	8.0	3.8	2.8	12
459	330 Astin Reed	496	0	8.0	3.8	2.8	12
460	330 Astin Reed	497	0	8.0	3.8	2.8	12
461	330 Astin Reed	498	0	8.0	3.8	2.8	12
462	330 Astin Reed	499	0	8.0	3.8	2.8	12
463	330 Astin Reed	500	0	8.0	3.8	2.8	12
464	330 Astin Reed	501	0	8.0	3.8	2.8	12
465	330 Astin Reed	502	0	8.0	3.8	2.8	12
466	330 Astin Reed	503	0	8.0	3.8	2.8	12
467	330 Astin Reed	504	0	8.0	3.8	2.8	12
468	330 Astin Reed	505	0	8.0	3.8	2.8	12
469	330 Astin Reed	506	0	8.0	3.8	2.8	12
470	330 Astin Reed	507	0	8.0	3.8	2.8	12
471	330 Astin Reed	508	0	8.0	3.8	2.8	12
472	330 Astin Reed	509	0	8.0	3.8	2.8	12
473	330 Astin Reed	510	0	8.0	3.8	2.8	12
474	330 Astin Reed	511	0	8.0	3.8	2.8	12
475	330 Astin Reed	512	0	8.0	3.8	2.8	12
476	330 Astin Reed	513	0	8.0	3.8	2.8	12
477	330 Astin Reed	514	0	8.0	3.8	2.8	12
478	330 Astin Reed	515	0	8.0	3.8	2.8	12
479	330 Astin Reed	516	0	8.0	3.8	2.8	12
480	330 Astin Reed	517	0	8.0	3.8	2.8	12
481	330 Astin Reed	518	0	8.0	3.8	2.8	12
482	330 Astin Reed	519	0	8.0	3.8	2.8	12
483	330 Astin Reed	520	0	8.0	3.8	2.8	12
484	330 Astin Reed	521	0	8.0	3.8	2.8	12
485	330 Astin Reed	522	0	8.0	3.8	2.8	12
486	330 Astin Reed	523	0	8.0	3.8	2.8	12
487	330 Astin Reed	524	0	8.0	3.8	2.8	12
488	330 Astin Reed	525	0	8.0	3.8	2.8	12
489	330 Astin Reed	526	0	8.0	3.8	2.8	12
490	330 Astin Reed	527	0	8.0	3.8	2.8	12
491	330 Astin Reed	528	0	8.0	3.8	2.8	12
492	330 Astin Reed	529	0	8.0	3.8	2.8	12
493	330 Astin Reed	530	0	8.0	3.8	2.8	12
494	330 Astin Reed	531	0	8.0	3.8	2.8	12
495	330 Astin Reed	532	0	8.0	3.8	2.8	12
496	330 Astin Reed	533	0	8.0	3.8	2.8	12
497	330 Astin Reed	534	0	8.0	3.8	2.8	12
498	330 Astin Reed	535	0	8.0	3.8	2.8	12
499	330 Astin Reed	536	0	8.0	3.8	2.8	12
500	330 Astin Reed	537	0	8.0	3.8	2.8	12
501	330 Astin Reed	538	0	8.0	3.8	2.8	12
502	330 Astin Reed	539	0	8.0	3.8	2.8	12
503	330 Astin Reed	540	0	8.0	3.8	2.8	12
504	330 Astin Reed	541	0	8.0	3.8	2.8	12
505	330 Astin Reed	542	0	8.0	3.8	2.8	12
506	330 Astin Reed	543	0	8.0	3.8	2.8	12
507	330 Astin Reed	544	0	8.0	3.8	2.8	12
508	330 Astin Reed	545	0	8.0	3.8	2.8	12
509	330 Astin Reed	546	0	8.0	3.8	2.8	12
510	330 Astin Reed	547	0	8.0	3.8	2.8	12
511	330 Astin Reed	548	0	8.0	3.8	2.8	12
512	330 Astin Reed	549	0	8.0	3.8	2.8	12
513	330 Astin Reed	550	0	8.0	3.8	2.8	12
514	330 Astin Reed	551	0	8.0	3.8	2.8	12
515	330 Astin Reed	552	0	8.0	3.8	2.8	12
516	330 Astin Reed	553	0	8.0	3.8	2.8	12
517	330 Astin Reed	554	0	8.0	3.8	2.8	12
518	330 Astin Reed	555	0	8.0	3.8	2.8	12

## ELECTRICALS

[illegible]

## ENGINEERING—Contd

1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044	2045	2046	2047	2048	2049	2050	2051	2052	2053	2054	2055	2056	2057	2058	2059	2060	2061	2062	2063	2064	2065	2066	2067	2068	2069	2070	2071	2072	2073	2074	2075	2076	2077	2078	2079	2080	2081	2082	2083	2084	2085	2086	2087	2088	2089	2090	2091	2092	2093	2094	2095	2096	2097	2098	2099	2100	2101	2102	2103	2104	2105	2106	2107	2108	2109	2110	2111	2112	2113	2114	2115	2116	2117	2118	2119	2120	2121	2122	2123	2124	2125	2126	2127	2128	2129	2130	2131	2132	2133	2134	2135	2136	2137	2138	2139	2140	2141	2142	2143	2144	2145	2146	2147	2148	2149	2150	2151	2152	2153	2154	2155	2156	2157	2158	2159	2160	2161	2162	2163	2164	2165	2166	2167	2168	2169	2170	2171	2172	2173	2174	2175	2176	2177	2178	2179	2180	2181	2182	2183	2184	2185	2186	2187	2188	2189	2190	2191	2192	2193	2194	2195	2196	2197	2198	2199	2200	2201	2202	2203	2204	2205	2206	2207	2208	2209	2210	2211	2212	2213	2214	2215	2216	2217	2218	2219	2220	2221	2222	2223	2224	2225	2226	2227	2228	2229	2230	2231	2232	2233	2234	2235	2236	2237	2238	2239	2240	2241	2242	2243	2244	2245	2246	2247	2248	2249	2250	2251	2252	2253	2254	2255	2256	2257	2258	2259	2260	2261	2262	2263	2264	2265	2266	2267	2268	2269	2270	2271	2272	2273	2274	2275	2276	2277	2278	2279	2280	2281	2282	2283	2284	2285	2286	2287	2288	2289	2290	2291	2292	2293	2294	2295	2296	2297	2298	2299	2300	2301	2302	2303	2304	2305	2306	2307	2308	2309	2310	2311	2312	2313	2314	2315	2316	2317	2318	2319	2320	2321	2322	2323	2324	2325	2326	2327	2328	2329	2330	2331	2332	2333	2334	2335	2336	2337	2338	2339	2340	2341	2342	2343	2344	2345	2346	2347	2348	2349	2350	2351	2352	2353	2354	2355	2356	2357	2358	2359	2360	2361	2362	2363	2364	2365	2366	2367	2368	2369	2370	2371	2372	2373	2374	2375	2376	2377	2378	2379	2380	2381	2382	2383	2384	2385	2386	2387	2388	2389	2390	2391	2392	2393	2394	2395	2396	2397	2398	2399	2400	2401	2402	2403	2404	2405	2406	2407	2408	2409	2410	2411	2412	2413	2414	2415	2416	2417	2418	2419	2420	2421	2422	2423	2424	2425	2426	2427	2428	2429	2430	2431	2432	2433	2434	2435	2436	2437	2438	2439	2440	2441	2442	2443	2444	2445	2446	2447	2448	2449	2450	2451	2452	2453	2454	2455	2456	2457	2458	2459	2460	2461	2462	2463	2464	2465	2466	2467	2468	2469	2470	2471	2472	2473	2474	2475	2476	2477	2478	2479	2480	2481	2482	2483	2484	2485	2486	2487	2488	2489	2490	2491	2492	2493	2494	2495	2496	2497	2498	2499	2500	2501	2502	2503	2504	2505	2506	2507	2508	2509	2510	2511	2512	2513	2514	2515	2516	2517	2518	2519	2520	2521	2522	2523	2524	2525	2526	2527	2528	2529	2530	2531	2532	2533	2534	2535	2536	2537	2538	2539	2540	2541	2542	2543	2544	2545	2546	2547	2548	2549	2550	2551	2552	2553	2554	2555	2556	2557	2558	2559	2560	2561	2562	2563	2564	2565	2566	2567	2568	2569	2570	2571	2572	2573	2574	2575	2576	2577	2578	2579	2580	2581	2582	2583	2584	2585	2586	2587	2588	2589	2590	2591	2592	2593	2594	2595	2596	2597	2598	2599	2600	2601	2602	2603	2604	2605	2606	2607	2608	2609	2610	2611	2612	2613	2614	2615	2616	2617	2618	2619	2620	2621	2622	2623	2624	2625	2626	2627	2628	2629	2630	2631	2632	2633	2634	2635	2636	2637	2638	2639	2640	2641	2642	2643	2644	2645	2646	2647	2648	2649	2650	2651	2652	2653	2654	2655	2656	2657	2658	2659	2660	2661	2662	2663	2664	2665	2666	2667	2668	2669	2670	2671	2672	2673	2674	2675	2676	2677	2678	2679	2680	2681	2682	2683	2684	2685	2686	2687	2688	2689	2690	2691	2692	2693	2694	2695	2696	2697	2698	2699	2700	2701	2702	2703	2704	2705	2706	2707	2708	2709	2710	2711	2712	2713	2714	2715	2716	2717	2718	2719	2720	2721	2722	2723	2724	2725	2726	2727	2728	2729	2730	2731	2732	2733	2734	2735	2736	2737	2738	2739	2740	2741	2742	2743	2744	2745	2746	2747	2748	2749	2750	2751	2752	2753	2754	2755	2756	2757	2758	2759	2760	2761	2762	2763	2764	2765	2766	2767	2768	2769	2770	2771	2772	2773	2774	2775	2776	2777	2778	2779	2780	2781	2782	2783	2784	2785	2786	2787	2788	2789	2790	2791	2792	2793	2794	2795	2796	2797	2798	2799	2800	2801	2802	2803	2804	2805	2806	2807	2808	2809	2810	2811	2812	2813	2814	2815	2816	2817	2818	2819	2820	2821	2822	2823	2824	2825	2826	2827	2828	2829	2830	2831	2832	2833	2834	2835	2836	2837	2838	2839	2840	2841	2842	2843	2844	2845	2846	2847	2848	2849	2850	2851	2852	2853	2854	2855	2856	2857	2858	2859	2860	2861	2862	2863	2864	2865	2866	2867	2868	2869	2870	2871	2872	2873	2874	2875	2876	2877	2878	2879	2880	2881	2882	2883	2884	2885	2886	2887	2888	2889	2890	2891	2892	2893	2894	2895	2896	2897	2898	2899	2900	2901	2902	2903	2904	2905	2906	2907	2908	2909	2910	2911	2912	2913	2914	2915	2916	2917	2918	2919	2920	2921	2922	2923	2924	2925	2926	2927	2928	2929	2930	2931	2932	2933	2934	2935	2936	2937	2938	2939	2940	2941	2942	2943	2944	2945	2946	2947	2948	2949	2950	2951	2952	2953	2954	2955	2956	2957	2958	2959	2960	2961	2962	2963	2964	2965	2966	2967	2968	2969	2970	2971	2972	2973	2974	2975	2976	2977	2978	2979	2980	2981	2982	2983	2984	2985	2986	2987	2988	2989	2990	2991	2992	2993	2994	2995	2996	2997	2998	2999	3000
------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------	------

## INDUSTRIALS (Miscel.)—Contd

[illegible]

## INDUSTRIALS (Miscel.) - Contd.

1938	1939	1940	1941	1942	1943	1944	1945	1946	1947	1948	1949	1950	1951	1952	1953	1954	1955	1956	1957	1958	1959	1960	1961	1962	1963	1964	1965	1966	1967	1968	1969	1970	1971	1972	1973	1974	1975	1976	1977	1978	1979	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044	2045	2046	2047	2048	2049	2050	2051	2052	2053	2054	2055	2056	2057	2058	2059	2060	2061	2062	2063	2064	2065	2066	2067	2068	2069	2070	2071	2072	2073	2074	2075	2076	2077	2078	2079	2080	2081	2082	2083	2084	2085	2086	2087	2088	2089	2090	2091	2092	2093	2094	2095	2096	2097	2098	2099	2100																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																					
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31	32	33	34	35	36	37	38	39	40	41	42	43	44	45	46	47	48	49	50	51	52	53	54	55	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75	76	77	78	79	80	81	82	83	84	85	86	87	88	89	90	91	92	93	94	95	96	97	98	99	100	101	102	103	104	105	106	107	108	109	110	111	112	113	114	115	116	117	118	119	120	121	122	123	124	125	126	127	128	129	130	131	132	133	134	135	136	137	138	139	140	141	142	143	144	145	146	147	148	149	150	151	152	153	154	155	156	157	158	159	160	161	162	163	164	165	166	167	168	169	170	171	172	173	174	175	176	177	178	179	180	181	182	183	184	185	186	187	188	189	190	191	192	193	194	195	196	197	198	199	200	201	202	203	204	205	206	207	208	209	210	211	212	213	214	215	216	217	218	219	220	221	222	223	224	225	226	227	228	229	230	231	232	233	234	235	236	237	238	239	240	241	242	243	244	245	246	247	248	249	250	251	252	253	254	255	256	257	258	259	260	261	262	263	264	265	266	267	268	269	270	271	272	273	274	275	276	277	278	279	280	281	282	283	284	285	286	287	288	289	290	291	292	293	294	295	296	297	298	299	300	301	302	303	304	305	306	307	308	309	310	311	312	313	314	315	316	317	318	319	320	321	322	323	324	325	326	327	328	329	330	331	332	333	334	335	336	337	338	339	340	341	342	343	344	345	346	347	348	349	350	351	352	353	354	355	356	357	358	359	360	361	362	363	364	365	366	367	368	369	370	371	372	373	374	375	376	377	378	379	380	381	382	383	384	385	386	387	388	389	390	391	392	393	394	395	396	397	398	399	400	401	402	403	404	405	406	407	408	409	410	411	412	413	414	415	416	417	418	419	420	421	422	423	424	425	426	427	428	429	430	431	432	433	434	435	436	437	438	439	440	441	442	443	444	445	446	447	448	449	450	451	452	453	454	455	456	457	458	459	460	461	462	463	464	465	466	467	468	469	470	471	472	473	474	475	476	477	478	479	480	481	482	483	484	485	486	487	488	489	490	491	492	493	494	495	496	497	498	499	500	501	502	503	504	505	506	507	508	509	510	511	512	513	514	515	516	517	518	519	520	521	522	523	524	525	526	527	528	529	530	531	532	533	534	535	536	537	538	539	540	541	542	543	544	545	546	547	548	549	550	551	552	553	554	555	556	557	558	559	560	561	562	563	564	565	566	567	568	569	570	571	572	573	574	575	576	577	578	579	580	581	582	583	584	585	586	587	588	589	590	591	592	593	594	595	596	597	598	599	600	601	602	603	604	605	606	607	608	609	610	611	612	613	614	615	616	617	618	619	620	621	622	623	624	625	626	627	628	629	630	631	632	633	634	635	636	637	638	639	640	641	642	643	644	645	646	647	648	649	650	651	652	653	654	655	656	657	658	659	660	661	662	663	664	665	666	667	668	669	670	671	672	673	674	675	676	677	678	679	680	681	682	683	684	685	686	687	688	689	690	691	692	693	694	695	696	697	698	699	700	701	702	703	704	705	706	707	708	709	710	711	712	713	714	715	716	717	718	719	720	721	722	723	724	725	726	727	728	729	730	731	732	733	734	735	736	737	738	739	740	741	742	743	744	745	746	747	748	749	750	751	752	753	754	755	756	757	758	759	760	761	762	763	764	765	766	767	768	769	770	771	772	773	774	775	776	777	778	779	780	781	782	783	784	785	786	787	788	789	790	791	792	793	794	795	796	797	798	799	800	801	802	803	804	805	806	807	808	809	810	811	812	813	814	815	816	817	818	819	820	821	822	823	824	825	826	827	828	829	830	831	832	833	834	835	836	837	838	839	840	841	842	843	844	845	846	847	848	849	850	851	852	853	854	855	856	857	858	859	860	861	862	863	864	865	866	867	868	869	870	871	872	873	874	875	876	877	878	879	880	881	882	883	884	885	886	887	888	889	890	891	892	893	894	895	896	897	898	899	900	901	902	903	904	905	906	907	908	909	910	911	912	913	914	915	916	917	918	919	920	921	922	923	924	925	926	927	928	929	930	931	932	933	934	935	936	937	938	939	940	941	942	943	944	945	946	947	948	949	950	951	952	953	954	955	956	957	958	959	960	961	962	963	964	965	966	967	968	969	970	971	972	973	974	975	976	977	978	979	980	981	982	983	984	985	986	987	988	989	990	991	992	993	994	995	996	997	998	999	1000

**FOOD, GROCERIES, ETC.**

1504	14542DA Gro. 100	Y	1564	4	4.1	3.3	12.0
1505	5707Aldo & Heidi's 100	Y	372	-42	3.8	2.9	3.0
1506	53Alpine Group 100	Y	43				
1507	1211Alpine Group 100	Y	43				
1508	150Alpine Group 100	Y	43				
1509	150Alpine Group 100	Y	43				
1510	150Alpine Group 100	Y	43				
1511	150Alpine Group 100	Y	43				
1512	150Alpine Group 100	Y	43				
1513	150Alpine Group 100	Y	43				
1514	150Alpine Group 100	Y	43				
1515	150Alpine Group 100	Y	43				
1516	150Alpine Group 100	Y	43				
1517	150Alpine Group 100	Y	43				
1518	150Alpine Group 100	Y	43				
1519	150Alpine Group 100	Y	43				
1520	150Alpine Group 100	Y	43				
1521	150Alpine Group 100	Y	43				
1522	150Alpine Group 100	Y	43				
1523	150Alpine Group 100	Y	43				
1524	150Alpine Group 100	Y	43				
1525	150Alpine Group 100	Y	43				
1526	150Alpine Group 100	Y	43				
1527	150Alpine Group 100	Y	43				
1528	150Alpine Group 100	Y	43				
1529	150Alpine Group 100	Y	43				
1530	150Alpine Group 100	Y	43				
1531	150Alpine Group 100	Y	43				
1532	150Alpine Group 100	Y	43				
1533	150Alpine Group 100	Y	43				
1534	150Alpine Group 100	Y	43				
1535	150Alpine Group 100	Y	43				
1536	150Alpine Group 100	Y	43				
1537	150Alpine Group 100	Y	43				
1538	150Alpine Group 100	Y	43				
1539	150Alpine Group 100	Y	43				
1540	150Alpine Group 100	Y	43				
1541	150Alpine Group 100	Y	43				
1542	150Alpine Group 100	Y	43				
1543	150Alpine Group 100	Y	43				
1544	150Alpine Group 100	Y	43				
1545	150Alpine Group 100	Y	43				
1546	150Alpine Group 100	Y	43				
1547	150Alpine Group 100	Y	43				
1548	150Alpine Group 100	Y	43				
1549	150Alpine Group 100	Y	43				
1550	150Alpine Group 100	Y	43				
1551	150Alpine Group 100	Y	43				
1552	150Alpine Group 100	Y	43				
1553	150Alpine Group 100	Y	43				
1554	150Alpine Group 100	Y	43				
1555	150Alpine Group 100	Y	43				
1556	150Alpine Group 100	Y	43				
1557	150Alpine Group 100	Y	43				
1558	150Alpine Group 100	Y	43				
1559	150Alpine Group 100	Y	43				
1560	150Alpine Group 100	Y	43				
1561	150Alpine Group 100	Y	43				
1562	150Alpine Group 100	Y	43				
1563	150Alpine Group 100	Y	43				
1564	150Alpine Group 100	Y	43				
1565	150Alpine Group 100	Y	43				
1566	150Alpine Group 100	Y	43				
1567	150Alpine Group 100	Y	43				
1568	150Alpine Group 100	Y	43				
1569	150Alpine Group 100	Y	43				
1570	150Alpine Group 100	Y	43				
1571	150Alpine Group 100	Y	43				
1572	150Alpine Group 100	Y	43				
1573	150Alpine Group 100	Y	43				
1574	150Alpine Group 100	Y	43				
1575	150Alpine Group 100	Y	43				
1576	150Alpine Group 100	Y	43				
1577	150Alpine Group 100	Y	43				
1578	150Alpine Group 100	Y	43				
1579	150Alpine Group 100	Y	43				
1580	150Alpine Group 100	Y	43				
1581	150Alpine Group 100	Y	43				
1582	150Alpine Group 100	Y	43				
1583	150Alpine Group 100	Y	43				
1584	150Alpine Group 100	Y	43				
1585	150Alpine Group 100	Y	43				
1586	150Alpine Group 100	Y	43				
1587	150Alpine Group 100	Y	43				
1588	150Alpine Group 100	Y	43				
1589	150Alpine Group 100	Y	43				
1590	150Alpine Group 100	Y	43				
1591	150Alpine Group 100	Y	43				
1592	150Alpine Group 100	Y	43				
1593	150Alpine Group 100	Y	43				
1594	150Alpine Group 100	Y	43				
1595	150Alpine Group 100	Y	43				
1596	150Alpine Group 100	Y	43				
1597	150Alpine Group 100	Y	43				
1598	150Alpine Group 100	Y	43				
1599	150Alpine Group 100	Y	43				
1600	150Alpine Group 100	Y	43				

## HOTELS AND CATERERS

111	464Alamo Ranch St. S. v.	68	1.5		
112	464Alamo Ranch St. S. v.	68	1.1	4.8	2.5
257	1888Friedley House 10p.	257	1.3	4.8	13.8
258	4300Rancho Metro. Sp. v.	258	0.2	3.1	0.9
259	4300Rancho Metro. Sp. v.	259	0.2	3.1	0.9
70	564Hornet 10p.	70	0.3	0.4	0.2
71	564Hornet 10p.	71	0.3	0.4	0.2
72	12600Lakewood Express S. v.	72	0.2	0.3	0.7
73	12600Lakewood Express S. v.	73	0.2	0.3	0.7
74	12600Lakewood Express S. v.	74	0.2	0.3	0.7
75	12600Lakewood Express S. v.	75	0.2	0.3	0.7
76	12600Lakewood Express S. v.	76	0.2	0.3	0.7
77	12600Lakewood Express S. v.	77	0.2	0.3	0.7
78	12600Lakewood Express S. v.	78	0.2	0.3	0.7
79	12600Lakewood Express S. v.	79	0.2	0.3	0.7
80	12600Lakewood Express S. v.	80	0.2	0.3	0.7
81	12600Lakewood Express S. v.	81	0.2	0.3	0.7
82	12600Lakewood Express S. v.	82	0.2	0.3	0.7
83	12600Lakewood Express S. v.	83	0.2	0.3	0.7
84	12600Lakewood Express S. v.	84	0.2	0.3	0.7
85	12600Lakewood Express S. v.	85	0.2	0.3	0.7
86	12600Lakewood Express S. v.	86	0.2	0.3	0.7
87	12600Lakewood Express S. v.	87	0.2	0.3	0.7
88	12600Lakewood Express S. v.	88	0.2	0.3	0.7
89	12600Lakewood Express S. v.	89	0.2	0.3	0.7
90	12600Lakewood Express S. v.	90	0.2	0.3	0.7
91	12600Lakewood Express S. v.	91	0.2	0.3	0.7
92	12600Lakewood Express S. v.	92	0.2	0.3	0.7
93	12600Lakewood Express S. v.	93	0.2	0.3	0.7
94	12600Lakewood Express S. v.	94	0.2	0.3	0.7
95	12600Lakewood Express S. v.	95	0.2	0.3	0.7
96	12600Lakewood Express S. v.	96	0.2	0.3	0.7
97	12600Lakewood Express S. v.	97	0.2	0.3	0.7
98	12600Lakewood Express S. v.	98	0.2	0.3	0.7
99	12600Lakewood Express S. v.	99	0.2	0.3	0.7
100	12600Lakewood Express S. v.	100	0.2	0.3	0.7
101	12600Lakewood Express S. v.	101	0.2	0.3	0.7
102	12600Lakewood Express S. v.	102	0.2	0.3	0.7
103	12600Lakewood Express S. v.	103	0.2	0.3	0.7
104	12600Lakewood Express S. v.	104	0.2	0.3	0.7
105	12600Lakewood Express S. v.	105	0.2	0.3	0.7
106	12600Lakewood Express S. v.	106	0.2	0.3	0.7
107	12600Lakewood Express S. v.	107	0.2	0.3	0.7
108	12600Lakewood Express S. v.	108	0.2	0.3	0.7
109	12600Lakewood Express S. v.	109	0.2	0.3	0.7
110	12600Lakewood Express S. v.	110	0.2	0.3	0.7
111	12600Lakewood Express S. v.	111	0.2	0.3	0.7
112	12600Lakewood Express S. v.	112	0.2	0.3	0.7
113	12600Lakewood Express S. v.	113	0.2	0.3	0.7
114	12600Lakewood Express S. v.	114	0.2	0.3	0.7
115	12600Lakewood Express S. v.	115	0.2	0.3	0.7
116	12600Lakewood Express S. v.	116	0.2	0.3	0.7
117	12600Lakewood Express S. v.	117	0.2	0.3	0.7
118	12600Lakewood Express S. v.	118	0.2	0.3	0.7
119	12600Lakewood Express S. v.	119	0.2	0.3	0.7
120	12600Lakewood Express S. v.	120	0.2	0.3	0.7
121	12600Lakewood Express S. v.	121	0.2	0.3	0.7
122	12600Lakewood Express S. v.	122	0.2	0.3	0.7
123	12600Lakewood Express S. v.	123	0.2	0.3	0.7
124	12600Lakewood Express S. v.	124	0.2	0.3	0.7
125	12600Lakewood Express S. v.	125	0.2	0.3	0.7
126	12600Lakewood Express S. v.	126	0.2	0.3	0.7
127	12600Lakewood Express S. v.	127	0.2	0.3	0.7
128	12600Lakewood Express S. v.	128	0.2	0.3	0.7
129	12600Lakewood Express S. v.	129	0.2	0.3	0.7
130	12600Lakewood Express S. v.	130	0.2	0.3	0.7

## INDUSTRIALS (Miscel.)

[illegible]

## INSURANCES

[illegible]

## LEISURE

[illegible]

ملک امامت الاسلام



## LONDON SHARE SERVICE

LEISURE - Contd									
1100	1101	1102	1103	1104	1105	1106	1107	1108	1109
1110	1111	1112	1113	1114	1115	1116	1117	1118	1119
1120	1121	1122	1123	1124	1125	1126	1127	1128	1129
1130	1131	1132	1133	1134	1135	1136	1137	1138	1139
1140	1141	1142	1143	1144	1145	1146	1147	1148	1149
1150	1151	1152	1153	1154	1155	1156	1157	1158	1159
1160	1161	1162	1163	1164	1165	1166	1167	1168	1169
1170	1171	1172	1173	1174	1175	1176	1177	1178	1179
1180	1181	1182	1183	1184	1185	1186	1187	1188	1189
1190	1191	1192	1193	1194	1195	1196	1197	1198	1199
1200	1201	1202	1203	1204	1205	1206	1207	1208	1209
1210	1211	1212	1213	1214	1215	1216	1217	1218	1219
1220	1221	1222	1223	1224	1225	1226	1227	1228	1229
1230	1231	1232	1233	1234	1235	1236	1237	1238	1239
1240	1241	1242	1243	1244	1245	1246	1247	1248	1249
1250	1251	1252	1253	1254	1255	1256	1257	1258	1259
1260	1261	1262	1263	1264	1265	1266	1267	1268	1269
1270	1271	1272	1273	1274	1275	1276	1277	1278	1279
1280	1281	1282	1283	1284	1285	1286	1287	1288	1289
1290	1291	1292	1293	1294	1295	1296	1297	1298	1299
1300	1301	1302	1303	1304	1305	1306	1307	1308	1309
1310	1311	1312	1313	1314	1315	1316	1317	1318	1319
1320	1321	1322	1323	1324	1325	1326	1327	1328	1329
1330	1331	1332	1333	1334	1335	1336	1337	1338	1339
1340	1341	1342	1343	1344	1345	1346	1347	1348	1349
1350	1351	1352	1353	1354	1355	1356	1357	1358	1359
1360	1361	1362	1363	1364	1365	1366	1367	1368	1369
1370	1371	1372	1373	1374	1375	1376	1377	1378	1379
1380	1381	1382	1383	1384	1385	1386	1387	1388	1389
1390	1391	1392	1393	1394	1395	1396	1397	1398	1399
1400	1401	1402	1403	1404	1405	1406	1407	1408	1409
1410	1411	1412	1413	1414	1415	1416	1417	1418	1419
1420	1421	1422	1423	1424	1425	1426	1427	1428	1429
1430	1431	1432	1433	1434	1435	1436	1437	1438	1439
1440	1441	1442	1443	1444	1445	1446	1447	1448	1449
1450	1451	1452	1453	1454	1455	1456	1457	1458	1459
1460	1461	1462	1463	1464	1465	1466	1467	1468	1469
1470	1471	1472	1473	1474	1475	1476	1477	1478	1479
1480	1481	1482	1483	1484	1485	1486	1487	1488	1489
1490	1491	1492	1493	1494	1495	1496	1497	1498	1499
1500	1501	1502	1503	1504	1505	1506	1507	1508	1509
1510	1511	1512	1513	1514	1515	1516	1517	1518	1519
1520	1521	1522	1523	1524	1525	1526	1527	1528	1529
1530	1531	1532	1533	1534	1535	1536	1537	1538	1539
1540	1541	1542	1543	1544	1545	1546	1547	1548	1549
1550	1551	1552	1553	1554	1555	1556	1557	1558	1559
1560	1561	1562	1563	1564	1565	1566	1567	1568	1569
1570	1571	1572	1573	1574	1575	1576	1577	1578	1579
1580	1581	1582	1583	1584	1585	1586	1587	1588	1589
1590	1591	1592	1593	1594	1595	1596	1597	1598	1599
1600	1601	1602	1603	1604	1605	1606	1607	1608	1609
1610	1611	1612	1613	1614	1615	1616	1617	1618	1619
1620	1621	1622	1623	1624	1625	1626	1627	1628	1629
1630	1631	1632	1633	1634	1635	1636	1637	1638	1639
1640	1641	1642	1643	1644	1645	1646	1647	1648	1649
1650	1651	1652	1653	1654	1655	1656	1657	1658	1659
1660	1661	1662	1663	1664	1665	1666	1667	1668	1669
1670	1671	1672	1673	1674	1675	1676	1677	1678	1679
1680	1681	1682	1683	1684	1685	1686	1687	1688	1689
1690	1691	1692	1693	1694	1695	1696	1697	1698	1699
1700	1701	1702	1703	1704	1705	1706	1707	1708	1709
1710	1711	1712	1713	1714	1715	1716	1717	1718	1719
1720	1721	1722	1723	1724	1725	1726	1727	1728	1729
1730	1731	1732	1733	1734	1735	1736	1737	1738	1739
1740	1741	1742	1743	1744	1745	1746	1747	1748	1749
1750	1751	1752	1753	1754	1755	1756	1757	1758	1759
1760	1761	1762	1763	1764	1765	1766	1767	1768	1769
1770	1771	1772	1773	1774	1775	1776	1777	1778	1779
1780	1781	1782	1783	1784	1785	1786	1787	1788	1789
1790	1791	1792	1793	1794	1795	1796	1797	1798	1799
1800	1801	1802	1803	1804	1805	1806	1807	1808	1809
1810	1811	1812	1813	1814	1815	1816	1817	1818	1819
1820	1821	1822	1823	1824	1825	1826	1827	1828	1829
1830	1831	1832	1833	1834	1835	1836	1837	1838	1839
1840	1841	1842	1843	1844	1845	1846	1847	1848	1849
1850	1851	1852	1853	1854	1855	1856	1857	1858	1859
1860	1861	1862	1863	1864	1865	1866	1867	1868	1869
1870	1871	1872	1873	1874	1875	1876	1877	1878	1879
1880	1881	1882	1883	1884	1885	1886	1887	1888	1889
1890	1891	1892	1893	1894	1895	1896	1897	1898	1899
1900	1901	1902	1903	1904	1905	1906	1907	1908	1909
1910	1911	1912	1913	1914	1915	1916	1917	1918	1919
1920	1921	1922	1923	1924	1925	1926	1927	1928	1929
1930	1931	1932	1933	1934	1935	1936	1937	1938	1939
1940	1941	1942	1943	1944	1945	1946	1947	1948	1949
1950	1951	1952	1953	1954	1955	1956	1957	1958	1959
1960	1961	1962	1963	1964	1965	1966	1967	1968	1969
1970	1971	1972	1973	1974	1975	1976	1977	1978	1979
1980	1981	1982	1983	1984	1985	1986	1987	1988	1989
1990	1991	1992	1993	1994	1995	1996	1997	1998	1999
2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
2010	2011	2012	2013	2014	2015	2016	2017	2018	2019
2020	2021	2022	2023	2024	2025	2026	2027	2028	2029
2030	2031	2032	2033	2034	2035	2036	2037	2038	2039
2040	2041	2042	2043	2044	2045	2046	2047	2048	2049
2050	2051	2052	2053	2054	2055	2056	2057	2058	2059
2060	2061	2062	2063	2064	2065	2066	2067	2068	2069
2070	2071	2072	2073	2074	2075	2076	2077	2078	2079
2080	2081	2082	2083	2084	2085	2086	2087	2088	2089
2090	2091	2092	2093	2094	2095	2096	2097	2098	2099
2100	2101	2102	2103	2104	2105	2106	2107	2108	2109
2110	2111	2112	2113	2114	2115	2116	2117	2118	2119
2120	2121	2122	2123	2124	2125	2126	2127	2128	2129
2130	2131	2132	2133	2134	2135	2136	2137	2138	2139
2140	2141	2142	2143	2144	2145	2146	2147	2148	2149
2150	2151	2152	2153	2154	2155	2156	2157	2158	2159
2160	2161	2162	2163	2164	2165	2166	2167	2168	2169
2170	2171	2172	2173	2174	2175	2176	2177	2178	2179
2180	2181	2182	2183	2184	2185	2186	2187	2188	2189
2190	2191	2192	2193	2194	2195	2196	2197	2198	2199
2200	2201	2202	2203	2204	2205	2206	2207	2208	2209
2210	2211	2212	2213	2214	2215	2216	2217	2218	2219
2220	2221	2222	2223	2224	2225	2226	2227	2228	2229
2230	2231	2232	2233	2234	2235	2236	2237	2238	2239
2240	2241	2242	2243	2244	2245	2246	2247	2248	2249
2250	2251	2252	2253	2254	2255	2256	2257	2258	2259
2260	2261	2262	2263	2264	2265	2266	2267	2268	2269
2270	2271	2272	2273	2274	2275	2276	2277	2278	2279
2280	2281	2282	2283	2284	2285	2286	2287	2288	2289
2290	2291	2292	2293	2294	2295	2296	2297	2298	2299
2300	2301	2302	2303	2304	2305	2306	2307	2308	2309
2310	2311	2312	2313	2314	2315	2316	2317	2318	2319
2320	2321	2322	2323	2324	2325	2326	2327	2328	2329
2330	2331	2332	2333	2334	2335	2336	2337	2338	2339
2340	2341	2342	2343	2344	2345	2346	2347	2348	2349
2350	2351	2352	2353	2354	2355	2356	2357	2358	2359
2360	2361	2362	2363	23					



## RISES AND FALLS YESTERDAY

## LONDON TRADED OPTIONS

	Rises	Falls	Same
British Funds .....	3	205	3
Corporations, Dominion and Foreign Bonds .....	1	19	3
Industrials .....	258	466	87
Financial and Properties .....	76	210	36
Oils .....	23	3	0
Plantations .....	0	2	0
Mines .....	49	31	11
Others .....	103	35	13
<b>Totals .....</b>	<b>513</b>	<b>900</b>	<b>158</b>

[illegible][illegible][illegible][illegible][illegible]

TRADITIONAL OPTIONS		
● First Dealings	Aug 29	Stocks dealt in for the call
● Last Dealings	Sep 2	included Marley, Mountleigh
● Last Declarations	Nov 24	Ryan International, Ferranti, Stan-
● For settlement	Dec 5	dard Chartered, Kelt Energy
For rate indications see end of		
London Share Service		

[illegible]**FINANCIAL TIMES**

**AMSTERDAM-  
ROTTERDAM BANK  
N.V.**  
**Amsterdam**  
**(The Netherlands)**

**Warrants attached to  
US\$ 100,000.00,-  
3½% Bonds due 1996**

Due to the decision to issue new shares to holders of ordinary shares in the above mentioned company a bonus of Dfl. 0.50 in ordinary shares from the Shares Premium Reserve with simultaneous addition to any reserve of a corresponding amount out of that portion of the profit over 1988 which is intended for distribution, the warrants exercise price will be reduced from Dfl. 116,60 to

**Dfl. 115,60**

as from August 12, 1988.

The Trustee  
**AMSTERDAMSCH  
TRUSTEE'S KANTOOR  
B.V.**

August 12, 1988  
N.Z. Voorburgwal 326-328  
Amsterdam  
**(The Netherlands)**

**World  
Economy**

The Financial Times  
proposes to publish  
this survey on:

**September 22nd**

For a full editorial  
synopsis and  
advertisement details,  
please contact:

**Hugh Sutton**  
on 01-248 8000 ext  
3238

or write to HIM at:

**Bracken House  
10 Cannon Street  
London  
EC4P 4BY**

---

**FINANCIAL TIMES**  
EUROPE'S BUSINESS NEWSPAPER

**August, 1988**

**ISSUE PRICE: 100 PER CENT.**

**Daiwa Europe Limited**

**Sumitomo Finance International**

**Yamaichi International (Europe) Limited**

**Sumitomo Trust International Limited**

### Banca del Cottardo

**Bank of Tokyo Capital Markets Group**

**Banque Bruxelles Lambert S.A.**

**Barclays de Zotte Wedd Limited**

**Bayerische Vereinsbank Aktiengesellschaft**

**James Capel & Co.**

**Citicorp Investment Bank Limited**

**Credit Suisse First Boston Limited**

**Dai-ichi Europe Limited**

**Goldman Sachs International Corp.**

**IBI International Limited**

**The Izumi Securities Co., Ltd.**

**KOKTISALE** — **1.1.1.1**

**LTCB International Limited**

**Memorandum** - **Exhibit 1** - **1**

**Meiko Europe Limited**

**Thames Valley Water Limited**

**I. P. Morgan Securities Asia Ltd.**

**THE INTERNATIONAL LIMITED**

**Nippon Credit International Limited**

**Securities Europe Limited**

**Norinchukin International Limited**

**Somura International Limited**

**J. Henry Schroder Wess & Co. Ltd.**

**Others International Limited**

**Universal A/E/C Limited**

**Société Générale**

**THE STATE OF TEXAS, COUNTY OF DALLAS,**







COMMODITIES AND AGRICULTURE

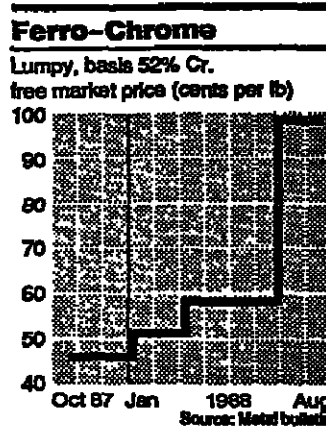
S African ferro-chrome rationed

By Jim Jones in Johannesburg

SOUTH AFRICA'S ferro-chrome producers are struggling, not against sanctions but against soaring world demand which has forced them to ration supplies to some customers.

Further, rationing could soon become as important a factor in the world market for ferro-manganese, if trends continue.

Ferro-chrome producer prices have been increased each quarter this year from just more than US\$50 a lb of contained chromium in January to 70 cents now. Higher prices are inevitable in the fourth quarter.



These prices, though, are for alloy delivered under long-term contracts. Mr John Coyte, marketing executive with Associated Ore & Metal (Assore), says spot metal currently sells for as much as \$1.20 a lb on the free market, underlining market tightness.

Ferro-alloy producers are less willing to discount prices for ferro-manganese. However, in round figures the price has risen from \$320 a tonne at

the year's start, to about \$550 for contract sales and about \$650 in the spot market.

Samancor, the largest ferro-chrome producer, estimates current demand is about 20 per cent greater than installed ferro-chrome capacity.

Its 300,000 tonne-a-year Ferrochrome plant and 150,000 tonne-a-year Rubusana plant are operating at full capacity simply to satisfy the demand of stainless-steel makers with

long-term sales contracts. Steelmakers who have relied on spot purchases are being rationed. They are mainly in the US and, some Johannesburg metals traders, rationing has led to allegations South Africa is applying counter-sanctions.

Ferro-chrome is specifically excluded from the list of South African products subject to US sanctions and local producers are adamant rationing in recent weeks is purely the result of market factors.

Mr Pieter du Plooy, who markets Samancor's ferro-chrome, said about half his company's US customers were affected by the rationing but that European and Japanese steelmakers buying spot material have also been rationed.

Paradoxically, some US steelmakers, those with so-called percentage contracts, are receiving more ferro-chrome than before. Their contracts bind Samancor to providing a fixed percentage of their needs.

Assore cut container-load deliveries to Korean and Taiwanese steelmakers, to ensure deliveries can be maintained to contractual customers in Europe, Japan and the US.

Mr Gert Jonker, the marketing director of Consolidated Metallurgical Industries, estimates world demand to be about 10 per cent greater now than the total 2.6m tonne-a-year installed capacity.

CMF operates two ferro-chrome production lines, each with annual installed capacity of 75,000 tonnes, and is considering adding capacity.

Mr Jonker said his company has no percentage contracts with customers, preferring so-called frame contracts, which do not bind buyer or seller to specific tonnage.

For now, higher dollar export prices, strong demand and a feeble rand are boosting alloy-makers' profits.

For example, Associated Manganese has just reported first-half sales of R208m (\$35.9m, at the financial rate) against R96m in the first half of last year.

Norway pessimistic of its oil prospects

By Karen Fosell in Stavanger

THE NORWEGIAN Petroleum Directorate yesterday issued by far its most pessimistic prognosis on Norway's oil-producing prospects.

The directorate is watching over the country's oil sector and adviser to the Ministry of Oil and Energy. Its Perspective Analysis report, traditionally used by Norwegian energy authorities for planning purposes, paints a gloomy picture.

It calls for a downward adjustment in expectations because of reduced activity in the petroleum sector, which will pose challenges in years ahead. It warns of:

- Declining prospects for new oil discoveries
- Uncertainty on hydrocarbon prices
- Limited sales potential from the country's rich gas resources
- Little chance to maintain investment activity in the sector after the first half of the 1990s

Norway began producing from the prolific Ekofisk field in 1971. Output has since climbed to more than 1m barrels of oil a day and about 28bn cubic metres of gas annually.

Government earnings generated by tax and royalties from the petroleum sector peaked in 1985 when they reached Nkr47bn (\$4bn). However, by 1988 they had fallen sharply to Nkr18bn.

This year's earnings are expected to fall even further, to Nkr12.5bn.

The report cast a heavy shadow over the opening in Stavanger, centre of Norway's petroleum activities, of the Offshore Northern Seas conference and exhibition.

This is one of the world's largest meetings concerned with petroleum activities. Total attendance is forecast at 25,000.

Ugandan initiative aims to aid small farmers

By Catherine Bond on a scheme which may be a good social service but bad banking

MRS MARY NABUULE is 53 years old and has a two-acre banana plot in southern Uganda. She, like most Ugandan peasants, does not hold the land title needed to obtain a commercial loan to develop her plot. Her husband abandoned her last year, leaving her with three children.

However, last October her prospects brightened. She became a beneficiary of a revolutionary scheme by the Uganda Commercial Bank. The scheme, first of its kind in Africa, grants character loans to small farmers, without security.

In Bangladesh, similar loans were given to small traders, resulting in excellent repayment records.

The aim of the UCB's Rural Farmers Scheme is to boost farm output by lending interest-free money as agricultural input, to the peasant farmers who form the backbone of Uganda's economy.

Mrs Nabuule was granted a loan of 55,000 Ugandan shillings to upgrade her banana crop. That was nominally worth \$816 at the official exchange rate ruling then but would now be worth only \$366 following the devaluation last month. At the time, she had barely enough food for her family.

She was interviewed by staff at the bank's Kyotera branch in the district, about 110 miles south of Kampala, and its agricultural officer visited her plot. The officer has since supervised the work as part of the effort to monitor loan use.

Mrs Nabuule has 18 months to repay, in seasonal instalments at the end of each harvest. This is a struggle, because bunches of the green banana and mutoko, a type of plantain which is a Ugandan staple, fetch only 300 shillings each in the local market.

Most of her loan came in the form of input - a hoe,

wheelbarrow, machete and coffee husks for mulching - with cash to pay labourers. Her plantation has since improved visibly. So far, she has repaid 9,500 shillings.

Bank officials say the high ratio of input, usually 80 per cent, safeguards against farmers squandering money and provides equipment that would otherwise be unavailable, or unaffordable at black-market prices.

For example, Mr Frank Mwend, the UCB chairman, can repay the cost of an outboard motor with a week's catch where, previously, they were unable to find money to buy.

● Poultry also seems a profitable industry, once farmers have inputs. Outside Kyotera a woman repaid a third of her one-year loan in three months.

Farmers repay 100 per cent of the loan with interest of up to 32 per cent, slightly less than the now commercial interest rate of 40 per cent. Spiralling inflation, about 400 per cent a year, means loan terms work in the farmer's favour.

The bank, since launching the scheme in May last year, has lent more than 400m shillings to about 7,000 peasants in just eight of Uganda's 33 districts.

About half the recipients are women. The scheme aims to give 80 per cent of its loans to women, because they account for 80 per cent of Uganda's farm output. The bank encourages women to form

co-operatives to procure loans. Dr Mwina says response to the scheme has been overwhelming. However, cash flow problems are holding up new loans and in many areas farmers are having to wait. Government prices for crops are low.

The bank is 100 per cent government-owned and, like other banks in Uganda, it has fallen victim to new curbs on government spending that appear to have cut the amount of cash available.

Vital foreign aid for input also falls far short of the US\$100m a year in revolving credit that Dr Mwina thinks necessary to grant loans nationwide and to make a real impact on agriculture.

The scheme has attracted more than US\$2m in foreign aid, including US\$18m from the African Development Bank. Dr Mwina is trying to convince potential donors of the merits of a scheme that directly benefits the poor and bypasses government ministries.

He says the scheme's recovery rate is quite high, a total of about 20m shillings to date. In a recent interview he said: "There is no defaulting. To the contrary, most of the money is repaid within a given period."

"I have a feeling these people will be more honest than urban people. Peasant farmers look at loans as a burden and think of it as setting a debt with God."

"We have a hard time persuading them that once they've repaid the loan, they are the best customers for a second line of credit."

However, other commercial banks doubt that all the inputs reach farmers and say they will not emulate UCB's rural branch expansion until communications are better.

One banker in Kampala said: "The Rural Farmers Scheme is a good social service but bad banking."

Hunt ruling pleases Peru

By Our Foreign Staff

THE Peruvian Government yesterday treated the \$134m US court ruling against the Hunt brothers of Texas for manipulating the silver market as a major vindication.

The suit was filed by Minpeco, the silver consortium, it was against the Hunt brothers and 72 other defendants and was initiated in 1981 with misgivings, given the legal complexities of proving a case for damages in silver commodities dealing.

Mr Mark Tymrot, the Minpeco lawyer, said after Saturday's ruling by a Manhattan jury: "Minpeco came to the United States to operate in sophisticated markets, believing that they were loyal and honest, but the system was manipulative and dishonest. Minpeco had faith in the legal system and has been rewarded."

Peru as the world's major silver exporter was anxious also demonstrate that the market could not be manipulated no matter how powerful and well-known the speculators might be. An offer of an initial \$20m out-of-court settlement was rejected by Minpeco.

Saudi Arabia cuts outlay on wheat output incentives

By Finn Barre in Riyadh

SAUDI ARABIA has begun to cut outlay on its wheat production incentives.

The kingdom, most of which is desert, has become a net wheat exporter through an expensive system of farm subsidies.

However, it is trimming its \$2,000 (\$533) a-tonne wheat output subsidy to \$1,500, but only for larger wheat producers. Smaller producers will continue to receive the old subsidy.

The Saudi Ministry of Agriculture and Water will also require the country's six large, publicly-held agricultural companies to plant half their grain crop in barley and half in wheat. The ratio is one-third barley, two-thirds wheat.

The overall effect on the kingdom's wheat crop will not

be all that great, say most experts, because the big six companies only account for between 10 per cent and 15 per cent of the country's total wheat crop.

However, if all producers farming more than 2,000 hectares are included in the subsidy cut, close to half the country's total wheat output could be affected.

Saudi Arabia began its wheat-subsidy programme more than a decade ago when annual output was 3,000 tonnes. The Government bought wheat at high prices and provided free land, subsidised fuel, electricity, loans, machinery and water. It had two goals:

- To become self-sufficient in wheat
- To redistribute oil wealth to rural areas.

The combined effect of the wheat subsidies amounted to almost 15 times the world wheat price. The actual government wheat-purchase price was \$3,500 a tonne.

The Government, alarmed at growing wheat surpluses - domestic consumption is only 800,000 tonnes a year - cut subsidies to \$2,000 a tonne in 1984 when total output was 1.3m tons. However, the response was disappointing and output surged every year since. Last year's harvest bill was \$5.6bn.

Diplomats and at least one of the big agriculture companies confirmed the agriculture ministry had announced its aim to implement the subsidy cut and the shift to barley output.

WHEAT STOCKS (Change during week ended last Friday)

Commodity	Unit	Price
Aluminium standard	1,000	53.325
Aluminium high grade	2,500	58.750
Copper Grade A	1,000	124.275
Lead	1,000	64.725
Nickel	1,000	2.288
Zinc	1,000	34.495
Tin	250	12,975
Silver (oz)	100,000	14,962,000

Gold struck in volume in Israel

By Laura Blumenfeld in Jerusalem

GOLD HAS been struck in Israel in potentially commercial volume, attracting mining interest from abroad.

The find, 19.85 made not far from the biblical King Solomon's copper mines at the tip of the Negev peninsula.

The Energy Ministry plans to put out an international tender to attract foreign exploration efforts if further research indicates extracting gold would be economically viable.

Israeli government geologists found big concentrations of gold in surface samples of stream sediments in an area covering several square kilometers of the southern Arava region.

Yesterday Dr Yacov Mimran, head of the Geological Institute, said the concentration reached two grams a tonne of earth, a level found in several active Brazilian and South African goldfields. Gold usually occurs at several

milligrams a tonne. The total volume of the precious metal has not been determined.

The gold was discovered at the end of a year-long national survey by the ministry's Geological Institute.

Mana Minerals, a private, Canadian-registered company, signed an exploration contract with ministry representatives three months ago authorising it to search for gold at five sites. Work is to begin next month.

UK milk farms 'unshaken by EC curb'

By Bridget Bloom, Agriculture Correspondent

THE European Community's imposition of milk quotas in 1984 had not shaken up the structure of milk production in England and Wales, a report by Britain's Ministry of Agriculture said.

The report covers only England and Wales and did not study those who, because of quotas, left the industry.

It said the total number of dairy farms had declined, but the number of cows fell only slightly faster than in the pre-quota period.

It said "the effects of the introduction of quotas have been neither dramatic nor disastrous" for those farmers who stayed in milk output.

The report notes that in general farmers sustained incomes through efficiencies, including switching from feeding concentrates to more effective use of grassland. Spending on concentrates in real terms in 1986-77 was little more than half that in 1976-77.

The report said dairy farms numbered 43,600 in 1980 and 37,400 in 1986. The number of cows fell to about 2.5m.

Average herd size rose in 1976-85 from 53 cows to 72. The numbers of regular family and hired workers fell from 204,000 in 1980 to 178,000 in 1986.

Milk yields per cow fell after introduction of quotas but by 1986-77 had recovered to pre-quota levels of about 5,500

litres a year per cow.

Milk per cow in real terms fell by about a fifth between 1976-77 and 1984-85 but improved slightly between 1984-85 and 1986-77.

The feeding of silage, made from grass, has risen rapidly since the mid-1970s, from 2,510 kg per cow in 1976-77 to 3,004 kg in 1986-77. The amount of concentrate fed to each cow fell from a peak 1,714 kg in 1982-83 to 1,458 kg in 1986-77.

The report said the impact of quotas was largely confined to adjustments in the dairy sector. There was little spill-over effect on other parts of the farming industry.

Milk Production Before and After Quotas. HMSO, £2.

litres a year per cow.

Milk per cow in real terms fell by about a fifth between 1976-77 and 1984-85 but improved slightly between 1984-85 and 1986-77.

The feeding of silage, made from grass, has risen rapidly since the mid-1970s, from 2,510 kg per cow in 1976-77 to 3,004 kg in 1986-77. The amount of concentrate fed to each cow fell from a peak 1,714 kg in 1982-83 to 1,458 kg in 1986-77.

The report said the impact of quotas was largely confined to adjustments in the dairy sector. There was little spill-over effect on other parts of the farming industry.

Milk Production Before and After Quotas. HMSO, £2.

LONDON MARKETS

STERLING'S weakness continued to buoy up copper prices on the London Metal Exchange yesterday. Early gains following Friday night's strength on the New York Comex were trimmed back in mid-morning as sellers were encouraged by the announcement of an unexpected fall in LME warehouse stocks last week. But as the currency factor helped to reassert the upward trend bullish speculators returned in force. By the close the cash grade A position had reached a 6-year high of £1,349.50 a tonne, adding £35.50 to last week's £48.50 advance. And three months metal was up £38 at £1,337.50 a tonne. Cash zinc's £10 rise to £795 a tonne was also largely due to the falling pound, but there was also dollar-based buying triggered by a fall through the \$1,300-a-tonne support point.

ON PRESENT DELIVERY PER TONNE CIF

Commodity	Price
Premium Gasoline	\$181.184
Gas Oil	\$181.183
Heavy Fuel Oil	\$82.7
Naphtha	\$139.141
Petroleum Argus Estimates	
Other	
Gold (per troy oz)	\$432.25
Silver (per troy oz)	\$16.15
Platinum (per troy oz)	\$556.4
Palladium (per troy oz)	\$123.5
Aluminium (free market)	\$2715
Copper (US Producer)	104 1/2-105 1/2
Lead (US Producer)	35
Nickel (free market)	640
Tin (European free market)	\$4440
Tin (Kuala Lumpur market)	\$4540
Tin (New York)	\$4450
Zinc (Euro. Prod. Price)	\$1274
Zinc (US Prime Western)	65 1/2
Cattle (live weight)	115.26p
Sheep (head weight)	168.05p
Pigs (live weight)	68.71p
London daily sugar (raw)	\$27.76
London daily sugar (white)	\$25.98
Tate and Lyle export price	\$22.20
Barley (English feed)	\$100.75
Maize (US No. 3 yellow)	\$137.5x
Wheat (US Dark Northern)	\$21.25x
Rubber (RSS No. 1)	72.00p
Rubber (RSS No. 2)	70.00p
Rubber (RSS No. 3)	70.00p
Rubber (RSS No. 4)	70.00p
Rubber (RSS No. 5)	70.00p
Rubber (RSS No. 6)	70.00p
Rubber (RSS No. 7)	70.00p
Rubber (RSS No. 8)	70.00p
Rubber (RSS No. 9)	70.00p
Rubber (RSS No. 10)	70.00p
Rubber (RSS No. 11)	70.00p
Rubber (RSS No. 12)	70.00p
Rubber (RSS No. 13)	70.00p
Rubber (RSS No. 14)	70.00p
Rubber (RSS No. 15)	70.00p
Rubber (RSS No. 16)	70.00p
Rubber (RSS No. 17)	70.00p
Rubber (RSS No. 18)	70.00p
Rubber (RSS No. 19)	70.00p
Rubber (RSS No. 20)	70.00p
Rubber (RSS No. 21)	70.00p
Rubber (RSS No. 22)	70.00p
Rubber (RSS No. 23)	70.00p
Rubber (RSS No. 24)	70.00p
Rubber (RSS No. 25)	70.00p
Rubber (RSS No. 26)	70.00p
Rubber (RSS No. 27)	70.00p
Rubber (RSS No. 28)	70.00p
Rubber (RSS No. 29)	70.00p
Rubber (RSS No. 30)	70.00p
Rubber (RSS No. 31)	70.00p
Rubber (RSS No. 32)	70.00p
Rubber (RSS No. 33)	70.00p
Rubber (RSS No. 34)	70.00p
Rubber (RSS No. 35)	70.00p
Rubber (RSS No. 36)	70.00p
Rubber (RSS No. 37)	70.00p
Rubber (RSS No. 38)	70.00p
Rubber (RSS No. 39)	70.00p
Rubber (RSS No. 40)	70.00p
Rubber (RSS No. 41)	70.00p
Rubber (RSS No. 42)	70.00p
Rubber (RSS No. 43)	70.00p
Rubber (RSS No. 44)	70.00p
Rubber (RSS No. 45)	70.00p
Rubber (RSS No. 46)	70.00p
Rubber (RSS No. 47)	70.00p
Rubber (RSS No. 48)	70.00p
Rubber (RSS No. 49)	70.00p
Rubber (RSS No. 50)	70.00p
Rubber (RSS No. 51)	70.00p
Rubber (RSS No. 52)	70.00p
Rubber (RSS No. 53)	70.00p
Rubber (RSS No. 54)	70.00p
Rubber (RSS No. 55)	70.00p
Rubber (RSS No. 56)	70.00p
Rubber (RSS No. 57)	70.00p
Rubber (RSS No. 58)	70.00p
Rubber (RSS No. 59)	70.00p
Rubber (RSS No. 60)	70.00p
Rubber (RSS No. 61)	70.00p
Rubber (RSS No. 62)	70.00p
Rubber (RSS No. 63)	70.00p
Rubber (RSS No. 64)	70.00p
Rubber (RSS No. 65)	70.00p
Rubber (RSS No. 66)	70.00p
Rubber (RSS No. 67)	70.00p
Rubber (RSS No. 68)	70.00p
Rubber (RSS No. 69)	70.00p
Rubber (RSS No. 70)	70.00p
Rubber (RSS No. 71)	70.00p
Rubber (RSS No. 72)	70.00p
Rubber (RSS No. 73)	70.00p
Rubber (RSS No. 74)	70.00p
Rubber (RSS No. 75)	70.00p
Rubber (RSS No. 76)	70.00p
Rubber (RSS No. 77)	70.00p
Rubber (RSS No. 78)	70.00p
Rubber (RSS No. 79)	70.00p
Rubber (RSS No. 80)	70.00p
Rubber (RSS No. 81)	70.00p
Rubber (RSS No. 82)	70.00p
Rubber (RSS No. 83)	70.00p
Rubber (RSS No. 84)	70.00p
Rubber (RSS No. 85)	70.00p
Rubber (RSS No. 86)	70.00p
Rubber (RSS No. 87)	70.00p
Rubber (RSS No. 88)	70.00p
Rubber (RSS No. 89)	70.00p
Rubber (RSS No. 90)	70.00p
Rubber (RSS No. 91)	70.00p
Rubber (RSS No. 92)	70.00p
Rubber (RSS No. 93)	70.00p
Rubber (RSS No. 94)	70.00p
Rubber (RSS No. 95)	70.00p
Rubber (RSS No. 96)	70.00p
Rubber (RSS No. 97)	70.00p
Rubber (RSS No. 98)	70.00p
Rubber (RSS No. 99)	70.00p
Rubber (RSS No. 100)	70.00p

COCA Cola

Commodity	Price
Cash 2000	2000
Cash 1000	1000
Cash 500	500
Cash 250	250
Cash 125	125
Cash 62.5	62.5
Cash 31.25	31.25
Cash 15.625	15.625
Cash 7.8125	7.8125
Cash 3.90625	3.90625
Cash 1.953125	1.953125
Cash 0.9765625	0.9765625
Cash 0.48828125	0.48828125
Cash 0.244140625	0.244140625
Cash 0.1220703125	0.1220703125
Cash 0.06103515625	0.06103515625
Cash 0.030517578125	0.030517578125
Cash 0.0152587890625	0.0152587890625
Cash 0.00762939453125	0.00762939453125
Cash 0.003814697265625	0.003814697265625
Cash 0.0019073486328125	0.0019073486328125
Cash 0.00095367431640625	0.00095367431640625
Cash 0.000476837158203125	0.000476837158203125
Cash 0.0002384185791015625	0.0002384185791015625
Cash 0.00011920928955078125	0.00011920928955078125
Cash 0.000059604644775390625	0.000059604644775390625
Cash 0.0000298023223876953125	0.0000298023223876953125
Cash 0.00001490116119384765625	0.00001490116119384765625
Cash 0.000007450580596923828125	0.000007450580596923828125
Cash 0.0000037252902984619140625	0.0000037252902984619140625
Cash 0.00000186264514923095703125	0.00000186264514923095703125
Cash 0.000000931322574615478515625	0.000000931322574615478515625
Cash 0.0000004656612873077392578125	0.0000004656612873077392578125
Cash 0.00000023283064365386962890625	0.00000023283064365386962890625
Cash 0.000000116415321826934814453125	0.000000116415321826934814453125
Cash 0.0000000582076609134674072265625	0.0000000582076609134674072265625
Cash 0.00000002910383045673370361328125	0.00000002910383045673370361328125
Cash 0.000000014551915228366851806640625	0.000000014551915228366851806640625
Cash 0.0000000072759576141834259033203125	0.0000000072759576141834259033203125
Cash 0.00000000363797880709171295166015625	0.00000000363797880709171295166015625
Cash 0.000000001818989403545856475830078125	0.000000001818989403545856475830078125
Cash 0.0000000009094947017729282379150390625	0.0000000009094947017729282379150390625
Cash 0.00000000045474735088646189596751953125	0.00000000045474735088646189596751953125
Cash 0.000000000227373675443230947983759765625	0.000000000227373675443230947983759765625
Cash 0.0000000001136868377216154739918798828125	0.0000000001136868377216154739918798828125
Cash 0.00000000005684341886080773699593994140625	0.00000000005684341886080773699593994140625
Cash 0.000000000028421709430403868497969970703125	0.000000000028421709430403868497969970703125
Cash 0.0000000000142108547152019342489849853515625	0.0000000000142108547152019342489849853515625
Cash 0.00000000000710542735760096712449249267578125	0.0







## NEW YORK STOCK EXCHANGE COMPOSITE PRICES

**3pm prices August 22**[illegible]

**Continued on Page 41**

هذه احدى الاصل



**3pm prices**  
**August 22**

[illegible]

**Nasdaq national market. 3pm prices August 22**

[illegible]

**Continued on Page 39**

**Europe's Business Newspaper**

the 1990s, the number of people in the world who are illiterate has increased from 1.2 billion to 1.5 billion. The number of illiterate people in the world is expected to reach 1.7 billion by the year 2015. The number of illiterate people in the world is expected to reach 1.7 billion by the year 2015. The number of illiterate people in the world is expected to reach 1.7 billion by the year 2015.

Company: \_\_\_\_\_  
Address: \_\_\_\_\_  
\_\_\_\_\_

Tel: \_\_\_\_\_



## AMERICA

## Equities decline as focus stays fixed on currencies

## Wall Street

EQUITIES suddenly went into reverse in the early afternoon yesterday after moving in a narrow range all morning as attention remained focused on events in the foreign exchange markets, writes Janet Bush in New York.

At 2pm the Dow Jones Industrial Average was down 18.49 at 1,997.51 after hovering virtually unchanged from its pre-weekend close in low volume of 74m shares.

US Treasury bond prices were quoted up to 1/2 point lower at midsession, with the yield on the benchmark long bond edging higher to 9.41 per cent.

No major economic releases were slated for yesterday and there was little to give either market direction. Both markets have reacted fully to economic news in recent months showing robust demand, to a half point rise in the US discount rate to 6.5 per cent and to a gradual tightening of monetary policy to bring Fed Funds up above 8 per cent.

But no-one is sure where to go from here, and volume in both stocks and bonds is

extremely low.

However, there are a number of indicators due for release this week that could provide a lead. Most important is today's consumer prices figures for July. Forecasts for the CPI are for a rise of 0.4 per cent to 0.5 per cent. Much will depend on what the figures look like stripped of food and energy prices.

Durable goods orders data for July are also due today and are expected to show a hefty decline after June's extremely strong rise.

On Thursday, the markets will be looking closely at revisions for second quarter GNP. Economists expect an upward revision but much depends on how large it is. Lastly, Friday sees the release of personal income and spending figures.

Overall, analysts appear to believe that markets are vulnerable to bad news and unlikely to derive much encouragement from good news.

The dollar continued to find strong demand yesterday and a number of European central banks and the US Federal Reserve appeared to be intervening on a small scale against the US currency.

Among featured stocks yesterday was Cherokee Group, which rejected a \$13-a-share offer by an investment group as inadequate. The company's shares added \$1 1/2 to \$12 1/2 in over-the-counter trading.

Wickes jumped \$3 1/2 to \$12 1/2 after the company said it had agreed to be taken private by a group led by its chairman, CP National rose \$1 1/2 to \$34 1/2. The company has agreed to a takeover by Alltel in a stock swap. Alltel slipped \$1 1/2 to \$24 1/2.

Varo, manufacturer of military electronic equipment, jumped \$2 1/2 to \$25 1/2 after it had accepted a takeover offer of \$35 a share from Imco. Universal whose stock fell \$1 1/2 to \$15 1/2.

## Canada

SELLING hit gold and energy stocks to leave share prices slightly off at midday. Industrials and base metal miners were flat in light trading.

The composite index lost 10.60 to 3,268.60 as declines outpaced advances by 287 to 177 on volume of 7.93b shares. Maclean Hunter led the most active, unchanged at C\$10.

## Thailand learns to dance to a foreign tune

Burgeoning foreign interest in Thailand's stock market this year has had a psychological impact on trading, bringing new influences to bear on investors.

As the economy heads for growth of 8 to 9 per cent, the Securities Exchange of Thailand has become increasingly attractive to foreigners and locals alike.

Investment funds specialising in Thailand are now listed in New York, London, Tokyo, and Singapore.

The effect has often been that prices respond more to monthly US trade figures than to what is happening in Thailand, as investors anticipate action by foreign buyers that does not always materialise.

In contrast, political uncertainty at home, including rumours of a coup following the dissolution of parliament on April 29, has had little impact on this year's steady climb. Investors seem to believe that the economy will force ahead whatever shape the government takes.

Between October 19 and mid-December last year, the effect of the global crash was to halve the SET index.

Confidence has recovered

## MARKET PROFILE



Thailand

significantly this year. Two weeks ago the index reached 471.45, within a hair's breadth of the October 18 all-time high of 472. However, it has since slipped to 432 amid nervousness over falls on Wall Street this month. The index is a weighted average of all share prices, adjusted periodically to account for the effect of rights issues on prices.

The 140-share market, which was capitalised at baht 252bn (\$10bn) at the start of August, has regained its popularity over the last two to three years. Investor demand has outstripped the supply of shares despite a steady flow of new listings and flotations.

Daily turnover this year has been about baht 745m -

roughly double last year's.

The 10 biggest stocks, mainly large banks and cement companies, account for about 52 per cent of capitalisation. Among the leading blue chips are Bangkok Bank, Thai Farmers Bank, Siam Commercial Bank, Siam Cement and Siam City Cement.

Charoen Pokphand, an agribusiness concern said to be Thailand's largest corporate group, and the prestigious Oriental Hotel were among this year's new listings. Nearly 100 listed companies reported combined first half profits up 60 per cent over the same period last year, with the 13 banks accounting for the largest share.

Brokers handle over-the-counter deals, but the SET is only just starting to collect data and officials say brokers are reluctant to report these transactions.

The brokers, mainly finance and securities companies owned by banks or bank executives, control trading, which is by "board knocking." Trades indicate their current trading positions by writing on the bid and offer boards the prices at which they are willing to operate, and then by knocking the

## STOCK MARKET FACT CHART THAILAND

Market capitalisation: Baht 252bn (\$10bn) (SET 23.11, SET 43)  
Number of shares listed: 117 ordinary, 4 unit trusts  
Top 10 stocks, percentage of market: 52%  
Trading hours: official - 9.30 am-11.30 am; no after hours  
Average daily turnover: 1988: baht 745m  
Main index: SET index (all shares weighted average)  
Current level of index: 432.52; 1988 high: 471.45 (84); 1988 low: 287.71 (4/1)  
Settlement: three business days after transaction  
Address: 2nd Floor, Siam Building, 132 Wireless Rd, Bangkok 10250, Thailand. Tel: (66-2) 239-0991 to 4, 239-0910 to 14.

boards with the plastic ends of their felt tip pens.

Trading is paper-based, although SET officials are considering computerisation by late 1990 or early 1991. Cash clearance through the SET is on the third trading day following the date of the transaction. The trading floor now has separate boards for shares bought and sold by foreign investors so that it is possible to see how close foreign ownership is to the permitted limits - 25 per cent for banks and between zero and 50 per cent for other companies, depending on the law and the company's articles of association. The SET will not transfer shares to foreign buyers if the limit has been reached.

A takeover and merger code is being discussed, but at present investors do not have to make public their purchases. Shares have equal voting rights. The authorities are considering non-voting shares for foreigners where ownership exceeds the limits, but none has been issued so far. Foreign companies, funds and other legally established entities pay 20 per cent withholding tax on dividends and 25 per cent tax on capital gains. Domestic individuals pay a progressive rate running from 7 per cent to 55 per cent, depending on the individual's tax rate.

Tomorrow: profile of the Philippines markets

Peter Ungphakorn

## ASIA PACIFIC

## Nikkei drops as investors play uneasy waiting game

## Tokyo

INVESTORS continued to be cautious in Tokyo yesterday, in anticipation of economic and political developments due this week at home and abroad, and share prices tumbled down, writes Michio Nakamoto in Tokyo.

The Nikkei average closed 130.24 lower at 28,079.18 in very weak volume, with only 600m shares traded compared with 1bn on Friday.

In later London trading, Japanese shares continued lower, with the 1988/Nikkei 50 index down 6.08 at 1,853.68.

Analysts in Tokyo said investors were anxiously awaiting any interest rate developments from the West German Bundesbank's meeting on Thursday, as well as US figures to be announced this week on consumer prices and second quarter gross national product.

In addition, an uneasy atmosphere surrounded the Japanese Diet (Parliament) Budget Committee, which convened again yesterday after a 10-day recess. Tougher measures to control insider trading and prevent evasions of capital gains taxes on share transactions are being demanded by opposition parties, and the Government appears to be wavering.

After rising slightly in morning trading, the Nikkei average fell steadily, dropping in the afternoon to a low of 28,000.10 before making a modest recovery towards the close. The high for the day was 28,281.64. Declines led advances by 477 to 341 and 209 issues were unchanged.

Non-ferrous metal issues were among stocks making gains, with Nippon Light Metal up Y86 at Y817.

Some heavy industry shares also rose. Fuji Heavy gained Y34 to Y828 on strong volume, and Sumitomo Heavy was the most active issue with 70.64m shares traded, adding Y28 to Y875.

Bearings companies showed increases, with NTN Toyo

Bearing rising Y35 to Y770.

Among electricals, Fujitsu, which rose last week on the strength of high earnings forecasts, closed Y30 up at Y1,930. Old Electric advanced Y40 to Y1,110 following a newspaper report that it was planning to begin mass production of four megabit memory chips next autumn.

Casio lost Y140 to Y1,510 after two days of maximum permitted rises last week and a brief swirl of controversy over the disclosure of its development of a new computer without the use of operating system software. The new computer is now thought to be an improved version of a calculator.

Several companies in the financial sector saw losses after reports at the weekend that many securities houses were now expecting significant reductions in profits in the year to September. Nomura lost Y90 to Y3,690 and Yamachi dropped Y30 to Y1,830. The bond market moved in a narrow range, with the benchmark government 105th bond closing at a yield of 5.115 per cent in large-lot trading, unchanged from last week's closing yield.

Trading in Osaka was dull, with investors staying on the sidelines. The OSE average lost 7.50 to 27,232.56.

## Roundup

DOMESTIC concerns led to profit-taking in Australia, virtually wiping out early gains, and kept investors on the sidelines in Singapore and Hong Kong. However, Taiwan surged through the 8,000 barrier to another record high.

AUSTRALIA closed only slightly higher as early selective buying trickled out in a wave of pre-Budget profit-taking.

Demand focused on the transport sector amid speculation that a cut in oil excise would be announced in today's Budget.

The All Ordinaries gained 2.4

to 1,643.1 after reaching a peak of 1,644.7.

Diamond miner Ashton lost 4 cents to A\$1.50 after posting a 42 per cent drop in net interim profit, while Posidon rose 5 cents to A\$2.25 following its takeover bid for Parang Mining, which also rose 5 cents to A\$1.80.

MM Holdings, the multinational resources group, lost 3 cents to A\$2.18. The company announced quadrupled annual profits of A\$172.9m, up from A\$28.6m, and an 11 per cent rise in sales and other revenue.

Bond Corporation rose 8 cents to A\$2.20. The brewing, media and property group reported that its profits had more than trebled and revenues doubled.

SINGAPORE moved slightly lower in thin trading, following the decline in Tokyo.

The Straits Times industrial index fell for the ninth consecutive day, slipping 5.77 to 1,075.78. Turnover shrank to 32.1m shares from 40.5m, with investors unwilling to take new positions before the general election on September 3. Promet was the most active issue on turnover of 2.3m shares.

HONG KONG was overshadowed by interest rate worries, and stocks fell in quiet trading. The Hang Seng index lost 15.61 to 2,564.14 as turnover slipped to HK\$416m from HK\$448m.

The decline came in spite of expectations of strong corporate results this week, including figures from Hongkong Bank and Cheung Kong.

Hongkong Bank gained 5 cents to HK\$6.20 while Cheung Kong fell 10 cents to HK\$7.15.

MANILA suffered a sharp setback after initial tests failed to confirm the presence of large oil reserves in the Verde offshore well. The composite index dropped 22.23, or 2 per cent, to end below 200 at 797.03.

TAIWAN burst through the 8,000 level, with banks, cement and construction stocks leading the way. The weighted index rose 211.99 to a record high of 8,160.89.

THE WEEK got off to a poor start in Europe yesterday, with traders chiefly divided on whether it was "very, very quiet" or "very, very dull." Interest rate worries and the continued absence of investors kept turnover to a minimum and left indices little changed, writes Our Markets Staff.

FRANKFURT had a featureless session as volume fell to a paltry DM1.3bn worth of shares.

With the dollar strengthening and little clear direction from Wall Street or Tokyo, attention focused on the next move from the Bundesbank, whose central council meets on Thursday. "Things are on ice until then," said one analyst.

There is growing speculation that the central bank will raise the securities repurchase rate again this week to bolster the D-Mark.

A report from the RWI economic institute that West German gross national product would slow to between 1 per cent and 1.5 per cent next year after 2 per cent this year was seen as contributing to a weak opening on the bourse.

The FAZ index edged up 0.68 to 482.47 but the DAX real time index of 30 blue chips finished 2.79 lower at 1,167.77.

Daimler, which said it expected a 1 per cent rise in domestic car sales this year and nearly 2 per cent in exports, gained DM3.50 to DM656.50. Other cars were easier.

Deutsche Babcock, the engineering group, fell DM7 to DM176 after its 10-month interim statement on Friday, which it said it expected flat profits this year.

Bonds eased in quiet trading amid concern about the D-Mark and uncertainty about interest rates.

The yield on the 6 1/2 per cent 1996 federal bond rose to 6.82 per cent from 6.80.

PARIS also suffered low turnover, with analysts predicting - and hoping - that activity would pick up after today's close of the monthly account. The CMC 50 index finished 1.08 easier at 352.53.

One of the few stocks to move significantly was Cie du Midi, which closed FF338 higher at FF1,272 after paying FF1.285 on its plans for a higher dividend and forecast of a 32 per cent rise in parent profit this year.

Food group BSN saw a healthy 3,685 shares traded,

closing FF30 higher at FF5,060 after hitting FF5,060. Pernod, the drinks group, which rose strongly last week, eased FF19 to FF1,110 after declining to comment on reports that it would act as a "white knight" for Irish Distillers in fending off a hostile bid from GrandMet of the UK. Last Thursday and Friday, about 200,000 Pernod shares changed hands in Paris, according to one trader.

ZURICH trading was undisturbed, with most stocks closing unchanged or slightly higher. The Credit Suisse index rose 2.4 to 477.2.

In the absence of corporate news, volume was light. There was little evidence of last week's local demand for small insurance stocks, which had followed takeover rumours, but there was some profit-taking in the sector.

One analyst pointed to "a bit of a recovery" in the banking sector following its weakness last week. Union Bank was heavily traded and its bearers gained SF30 to SF3,240.

## London

WORRIES about interest rates and forthcoming economic data on both sides of the Atlantic pushed London lower in one of the quietest sessions this year. The FTSE 100 index fell 12 to 1,832.3.

International stocks firmed. Bechem, Glaxo and ICI all recorded slight falls.

In the engineering sector, Oerlikon-Bühler lost SF10 to SF1.22 in strong volume, while Brown Boveri picked up SF45 to SF2,380 in anticipation of results from the merged group Asea Brown Boveri next week.

MILAN eased in fairly quiet trading after last week's strength, with the Comit index off 2.02 at 536.50.

The main feature was insurer Generali, up L50 at L292,500 after reaching L283,200 after hours amid interest in its September rights issue and continued foreign buying.

AMSTERDAM was discouraged by the early fall on Wall Street and finished at its day's lows in dull trading.

Uncertainty over the dollar and interest rates kept investors away. The CDS all-share index slipped 1.5 to 96.4.

Among transport stocks, Nedlloyd, which reported a disappointing operating performance last week, fell FI 11.80 to FI 223.30 after going ex FI 7 dividend.

Fakhoed, the transport and storage company which has a rights issue pending, lost FI 3.30 to FI 82.50.

MADRID continued to feel the effects of the higher-than-expected July inflation figure of 1.3 per cent, and the general index ended 1.14 lower at 291.97.

BRUSSELS was little changed to lower after a quiet session. One of the more active stocks was utility Intercom, unchanged at BF1,340 with 13,800 shares changing hands.

OSLO closed lower in thin trading, with the all-share index losing 3.68 to 285.76.

Saga Petroleum, Norway's largest private oil company, fell Nkr2.50, or 3 per cent, to Nkr75 after announcing it expected profits to fall by two-thirds this year to around Nkr180m.

STOCKHOLM ended little changed in indifferent trade. Interim reports from Atlas Copco, Electrolux and Ericsson, due this week, are expected to boost the market. Sandvik, the engineering and metals company, forecast a 32 per cent increase in 1988 profits after reporting a 37 per cent rise in six-month figures. Its share price rose Skr2 to Skr218.

DIRECTIONLESS trade left stocks mixed in Johannesburg. Among golds, Elandsrand gained 60 cents to R14.85, but Vasil Reef lost R2 to R260 and Beatrix 25 cents to R12. Mining financial Anglo American shed 50 cents to R53.

SOUTH AFRICA

## FT-ACTUARIES WORLD INDICES

Jointly compiled by the Financial Times, Goldman, Sachs & Co., and Wood Mackenzie & Co. Ltd., in conjunction with the Institute of Actuaries and the Faculty of Actuaries

NATIONAL AND REGIONAL MARKETS	FRIDAY AUGUST 19 1988					THURSDAY AUGUST 18 1988					DOLLAR INDEX		
	US Dollar Index	Day's Change %	Pound Sterling Index	Local Currency Index	Gross Div. Yield	US Dollar Index	Pound Sterling Index	Local Currency Index	1988 High	1988 Low	Year ago (approx)		
Figures in parentheses show number of stocks per grouping													
Australia (87)	152.10	+1.7	132.49	124.33	3.62	149.57	130.56	123.31	152.10	91.16	157.19		
Austria (16)	86.19	+0.0	75.08	84.81	2.45	86.17	75.21	84.85	98.18	83.72	97.01		
Belgium (63)	110.62	+0.4	96.36	109.81	4.06	110.20	96.19	109.65	139.89	99.14	134.59		
Canada (128)	118.86	+0.5	103.54	105.61	3.22	118.27	103.23	105.38	128.91	107.06	139.65		
Denmark (39)	122.44	+0.2	106.66	120.53	2.45	122.23	106.69	120.53	132.72	111.42	119.10		
Finland (26)	124.46	+0.7	108.41	116.89	1.47	122.58	107.87	115.88	139.55	106.78			
France (129)	90.30	+0.9	78.83	91.07	3.57	89.72	78.32	90.57	99.62	72.77	109.56		
West Germany (100)	73.37	-0.7	63.91	72.16	2.56	73.86	64.47	72.89	80.79	67.78	104.87		
Hong Kong (46)	104.39	+0.0	90.94	104.58	4.28	104.44	91.16	104.64	111.86	84.90	139.13		
Ireland (18)	133.02	+1.5	115.87	132.04	3.61	131.01	114.36	130.32	144.25	104.60	139.31		
Italy (102)	72.70	+0.4	63.33	76.11	2.65	72.42	63.22	76.01	81.74	62.99	97.29		
Japan (456)	165.04	+0.1	143.76	139.22	0.52	164.89	143.92	138.93	177.27	133.61	149.93		
Malaysia (36)	142.44	-1.9	124.08	145.54	2.54	145.14	126.68	147.85	154.17	107.83	181.83		
Mexico (15)	150.83	-0.2	131.38	156.90	1.44	151.08	131.87	157.94	160.07	90.07	313.86		
Netherlands (38)	103.23	+0.5	89.92	100.61	4.55	102.75	89.69	100.46	110.66	95.23	131.41		
New Zealand (20)	77.60	-1.0	67.59	64.07	3.75	78.35	68.39	63.59	84.05	64.42	125.32		
Norway (25)	116.02	+0.1	101.07	108.94	2.77	115.94	101.20	108.78	132.23	98.55	172.79		
Singapore (26)	104.56	-1.0	108.50	116.92	2.26	125.87	109.87	118.04	135.89	97.99	168.75		
South Africa (60)	116.02	+0.8	101.06	87.09	4.87	111.80	97.59	87.05	104.75	109.87	171.45		
Spain (43)	145.13	-0.1	126.42	136.28	3.32	145.32	126.85	136.62	164.47	130.73	146.46		
Sweden (35)	113.43	+0.1	98.81	108.85	2.62	113.37	98.96	108.88	125.50	96.92	129.77		
Switzerland (55)	75.91	+0.5	66.12	74.89	2.29	75.50	65.90	74.70	86.75	75.50	109.22		
United Kingdom (394)	125.81	+0.7	114.24	124.34	4.34	124.31	113.74	113.74	141.18	123.09	147.08		
USA (580)	106.44	-0.2	92.72	106.44	3.73	106.71	93.14	106.71	112.47	99.19	137.02		
Europe (1013)	103.92	+0.4	90.52	97.03	3.75	103.47	90.32	96.84	110.82	97.01	124.44		
Pacific Basin (673)	162.11	+0.1	141.21	126.19	0.26	161.89	141.72	139.81	164.72	139.81	124.44		
Euro-Pacific (1684)	138.84	+0.2	120.94	121.19	1.63	138.53	120.91	120.94	147.53	120.36	139.76		
North America (708)	107.10	-0.2	93.29	106.41	3.70	107.32	93.68	106.65	113.29	99.78	157.16		
Europe Ex. UK (689)	86.97	+0.2	75.76	86.26	3.14	86.93	75.79	86.35	92.99	80.27	110.41		
Pacific Ex. Japan (215)	126.81	+0.8	110.46	111.74	3.84	125.79	109.80	111.27	128.27	87.51	148.84		
Asia Pacific (1885)	137.93	+0.3	120.93	120.93	1.27	137.47	120.93	120.93	146.49	120.21	140.40		
World Ex. UK (2141)	125.23	+0.0	109.08	115.69	2.14	125.19	109.27	115.67	131.77	111.77	158.14		
World Ex. So. Af. (2405)	125.81	+0.1	109.59	115.75	2.34	125.71	109.73	115.68	132.39	113.26	138.72		
World Ex. Japan (2049)	106.90	+0.1	93.12	103.43	3.74	106.79	93.22	103.47	112.43	100.00	133.68		
The World Index (2465)	125.75	+0.1	109.54	115.56	2.35	125.63	109.66	115.48	132.38	113.37	138.93		